

06-096

Department of Environmental Protection

Maine Solid Waste Management Rules

CHAPTER 425

ASBESTOS MANAGEMENT REGULATIONS

Last Revised:

~~May 29, 2004~~

2010

Chapter 425: ASBESTOS MANAGEMENT REGULATIONS**TABLE OF CONTENTS**

	Page
C -1. Definitions	1
D -2. General Provisions	10
(1) A Applicability	10
(2) B Relationship to Other Rules	11
(3) C Right of Entry	11
(4) D Prohibition	11
(5) E Exemptions	11
(6) F Activities Not Subject to this Rule	11
(7) G Conflict of Interest	12
3. Notification Requirements	12
A. Applicability	12
B. General Requirements	12
C. Alternative Notification Procedures	15
D. Notification Revision Procedures	16
4. License Requirements For Business and Public Entities	17
A. General License Requirements	17
B. Asbestos Abatement Contractor	20
C. In-house Asbestos Abatement Unit	23
D. Asbestos Consultant	24
E. Asbestos Analytical Laboratory	25
F. Training Provider	28
5. Certification Requirements For Asbestos Professionals	30
A. General Certification Requirements	30
B. Standards of Conduct	31
C. Application Requirements and Procedures	31
D. Required Certification	34
E. Training, Education and Experience Requirements	35
F. Responsibilities	37
6. Pre-Abatement Requirements	38
A. Renovation and Demolition Inspections	38
B. Inspection Requirements	39
C. Design	40
D. Disclosure	41
7. Asbestos Abatement Work Practice Requirements	42
A. General Work Practice Requirements	42
B. Alternative Work Practice Requirements for Demolition Activities	48
C. Additional Requirements for Enclosure and Encapsulation Activities	49
(20) D. <u>A</u> Alternative Work Practice Requirements for Roofing and Exterior Asbestos-Containing Cementitious Products Projects	50
E. Waste Shipment Records	51
F. <u>Non-Standard</u> Variances to Work Practice Requirements	53
8. Monitoring Requirements and Requirements for Release of the Regulated Area	55
A. Monitoring Requirements	55
B. Release of Regulated Area	55
9. Permit-by-Rule for Asbestos Waste Storage Facilities	58

A. General Requirements	58
B. Location	58
C. General Application Requirements	58
D. Application Procedures	58
E. AWSF Operations Manual Requirements	59
10. Approval and Conduct of Training Courses	60
A. Approval of Training Courses	60
B. Application Requirements for Approval of Training Courses	61
C. Renewal Application Requirements for Approval of Training Courses	62
D. Successful Course Completion	63
E. Examinations	63
F. Reciprocity	64
G. Course Notification to Department	64
H. Course Times	64
11. Regulations Incorporated by Reference	64
A. Harmony	64
B. Regulations Incorporated	64
C. Applicability	65
D. Substitution of Definitions	65
E. Conflict of Federal and State Law	65

CHAPTER 425: ASBESTOS MANAGEMENT REGULATIONS

SUMMARY: This chapter establishes the rules of the Board and the Department for the licensing of business and public entities and the certification of individuals engaged in asbestos abatement activities. These rules also set forth notification and work practice requirements for asbestos abatement activities. Storage of asbestos waste is also regulated by this rule. This rule supersedes former Chapter 425, Asbestos Management Regulations effective date, January -1, 1994.

1. Definitions. The following terms as used in the Maine Asbestos Law and in this rule shall have the following meanings, unless the context indicates otherwise.

A. Abrade: "Abrade" means to wear away or rub off by friction asbestos-containing materials such that the asbestos-containing material is friable.

B. ACM: "ACM" means asbestos-containing material.

C. Adequately wet: "Adequately wet" means to sufficiently mix or penetrate with liquid to prevent visible emissions and the release of any particulates during handling. Asbestos-containing material that is adequately wet will have no visible emissions when handled and will feel moist to the touch. The absence of visible emissions is not sufficient evidence of being adequately wet.

D. Aggressive method: "Aggressive method" means removal or disturbance by sanding, cutting, grinding, or abrading.

Aggressive sampling. "Aggressive sampling" means sweeping the walls, ceiling and floor of a regulated area with the exhaust of a minimum one (1) horsepower leaf blower immediately preceding air clearance sampling, then placing a stationary fan for each 10,000 square feet of regulated area floor area in the regulated area with the fan air directed to the ceiling, and running the fan(s) throughout the air sampling event.

E. AHERA: "AHERA" means Asbestos Hazard Emergency Response Act; Enabling legislation, enacted on October 22, 1986, authorizing EPA to promulgate the "Asbestos-Containing Materials in Schools" rule, 40 CFR Part 763 [as amended], with an effective date of December 14, 1987.

F. AIHA: "AIHA" means American Industrial Hygiene Association.

G. Air clearance sampling: "Air clearance sampling" means air monitoring conducted by a certified asbestos air monitor at the conclusion of an asbestos abatement activity.

H. Air monitoring: "Air monitoring" means collecting samples of air before, during, or after an asbestos abatement activity to measure the concentration of ~~asbestos or~~ airborne fibers.

I. Alter: "Alter" means to modify, change, or remove.

J. Applicant: "Applicant" means an individual, business entity, or public entity formally requesting from the Department a license or certificate to engage in an asbestos abatement activity regulated by this rule.

- K. Area monitoring:** "Area monitoring" means air monitoring, excluding personal sampling, performed inside, outside, and/or adjacent to the regulated area in order to determine whether elevated fiber counts are being generated during a particular abatement activity.
- L. Asbestos:** "Asbestos" means a group of naturally occurring minerals that separate into fibers of high tensile strength and are resistant to heat, wear, and chemicals, including, but not limited to, the asbestiform varieties of serpentine (chrysotile), riebeckite (crocidolite), cummingtonite-gunerite (amosite), anthophyllite, actinolite, tremolite, and any of these minerals that have been chemically treated or altered.
- M. Asbestos abatement activity:** For purposes of this rule, "asbestos abatement activity" means any activity involving the removal, demolition, enclosure, repair, encapsulation, or handling of asbestos-containing materials in an amount greater than 3 square feet or 3 linear feet. "Asbestos abatement activity" includes associated activities such as design, monitoring, analysis, and inspection of asbestos-containing materials in an amount greater than 3 square feet or 3 linear feet, and conducting training for persons seeking a state certificate or license.
- N. Asbestos abatement contractor:** "Asbestos abatement contractor" means a business entity licensed by the Department that engages in, or intends to engage in, asbestos abatement activities as a business service and that employs or involves one or more asbestos abatement project supervisors, asbestos abatement workers, asbestos abatement design consultants, asbestos air monitors, or asbestos inspectors for asbestos abatement activities.
- O. Asbestos abatement design consultant:** "Asbestos abatement design consultant" means a Department-certified individual engaged in preparing and supervising the implementation of facility plans for the removal or abatement of asbestos. These activities include, but are not limited to: the performance of air quality and bulk sampling; advising building owners, contractors, and project supervisors on health impacts of asbestos abatement activities; and supervising the conduct of training courses. This category of specialists includes, but is not limited to, engineers, architects, health professionals, industrial hygienists, private consultants, or other individuals involved in asbestos risk assessment or regulatory activities.
- P. Asbestos abatement project supervisor:** "Asbestos abatement project supervisor" means a Department-certified individual with responsibility for the supervision of asbestos abatement activities. These persons include, but are not limited to: project supervisors employed by contractors or by in-house asbestos abatement units; and employees of governmental or public entities who coordinate or directly supervise asbestos abatement activities performed by public schools, governmental, or other public employees in a school district, governmental, or other public buildings.
- Q. Asbestos abatement worker:** "Asbestos abatement worker" means a Department-certified individual engaging in any asbestos abatement activity for any employer.
- R. Asbestos air analyst:** "Asbestos air analyst" means a Department-certified individual engaging in the analysis of air samples for fiber count including, but not limited to, asbestos.
- S. Asbestos air monitor:** "Asbestos air monitor" means a Department-certified individual who is responsible for conducting air and/or project monitoring prescribed by this rule and other rules and regulations in order to protect the public health from the hazards associated with exposure to asbestos.

- T. Asbestos analytical laboratory:** "Asbestos analytical laboratory" means a business entity or public entity licensed by the Department that qualitatively or quantitatively analyzes samples of solids, liquids or gases for fibers including asbestos fibers.
- U. Asbestos associated activity:** "Asbestos associated activity" means asbestos-related activity, such as inspection, design, monitoring, analysis, and the provision of training to persons seeking to become certified as asbestos professionals, conducted generally in support of asbestos abatement activity, but excluding removal, demolition, enclosure, handling, repair, or encapsulation of ACM.
- V. Asbestos bulk analyst:** "Asbestos bulk analyst" means a Department-certified individual engaging in the analysis of bulk samples for asbestos and/or other material composition for qualitative or quantitative purposes.
- W. Asbestos-containing cementitious product:** "Asbestos-containing cementitious product" means any pre-formed material or product manufactured with asbestos mixed into cement. Commonly referred to as transite, it includes but is not limited to piping, board, and siding.
- X. Asbestos consultant:** "Asbestos consultant" means a business entity licensed by the Department that engages in, or intends to engage in, the design, inspection, or monitoring of asbestos abatement activities.
- Y. Asbestos-containing material:** "Asbestos-containing material" means any material containing asbestos in quantities greater than or equal to 1% by volume as determined by weight, visual evaluation, and/or point count analysis.
- Z. Asbestos-contaminated material:** "Asbestos-contaminated material" means any solid, liquid, or waste material that contains asbestos or is contaminated with asbestos.
- AA. Asbestos impact survey:** "Asbestos impact survey" means asbestos inspection.
- BB. Asbestos inspector:** "Asbestos inspector" means a Department-certified individual whose activities include, but are not limited to, collecting bulk samples and assessing the potential for exposure associated with the presence of ACM.
- CC. Asbestos management planner:** "Asbestos management planner" means a Department-certified individual who assesses hazards associated with the presence and condition of ACM in schools, and who develops a response action plan based upon assessment.
- DD. Asbestos professional:** "Asbestos professional" means an individual certified by the Department to engage in asbestos abatement activities, including but not limited to, asbestos abatement worker, asbestos abatement project supervisor, asbestos air monitor, asbestos inspector, asbestos abatement design consultant, asbestos management planner, asbestos bulk analyst, and asbestos air analyst.
- EE. Asbestos waste:** "Asbestos waste" means any asbestos-contaminated material, asbestos debris, or asbestos-containing waste generated from an asbestos abatement activity or any other source that is discarded and considered a waste material.
- FF. Asbestos waste storage facility or AWSF:** "Asbestos waste storage facility" or "AWSF" means a temporary storage container or building where more than one cubic yard of asbestos waste is

stored. An "asbestos waste storage facility" does not include the storage of asbestos waste on the site of generation during the asbestos abatement activity and for a period not exceeding 5 days after completion of the project or areas where asbestos waste is being stored or placed for less than 1 day such as vehicles, loading docks, and staging areas.

GG. Board: "Board" means the Maine Board of Environmental Protection.

HH. Building: "Building" means any discrete structure suitable for housing individuals, equipment, or other items, including but not limited to the heating, ventilation, and air conditioning systems servicing that building. The foundation layout generally comprises the dimensions of a "building". For purposes of this rule, structures connected by a portico, exterior hallway, corridor, or similar passageway are not considered to be the same "building".

II. Business entity: "Business entity" means a partnership, firm, association, corporation, sole proprietorship, or any other form of business concern.

JJ. Certificate: "Certificate" means a document issued to an individual by the commissioner affirming that an individual has successfully completed the training and other requirements set forth in this rule to qualify as an asbestos professional.

KK. Clean room: "Clean room" means the section of a decontamination facility or unit where clean clothes and towels are located and that separates the shower room from the outside of a containment or regulated area. The clean room must be a minimum of 24 square feet for projects involving 3 or fewer certified individuals working for the contractor entering the regulated area per work shift and a minimum of 32 square feet for all other projects.

LL. Commissioner: "Commissioner" means the Commissioner of the Department of Environmental Protection.

MM. Competent person: "Competent person" means, for roofing, cementitious ~~products~~-siding, and demolition by large equipment projects subject to OSHA jurisdiction, the individual capable of identifying existing asbestos hazards in the work site who has the authority to take prompt corrective measures to eliminate such hazards, as defined in the OSHA Asbestos Standard for Construction, 29 CFR 1926.1101 (amended and corrected), effective date August 10, 1994.

Note: A competent person must attend a comprehensive asbestos training course (i.e. the asbestos abatement supervisor training course set forth in EPA's Model Accreditation Program, (40 CFR Part 763, Appendix C to Subpart E) conducted by an accredited asbestos training provider, or a course that is equivalent in length and content.

NN. Containerize: "Containerize" means the sealing of asbestos waste in fiber-tight polyethylene sheeting, ~~or~~ in a fiber-tight metal, plastic, or fiber drum with a locking lid, or in leak-proof containers.

OO. Containment: "Containment" means a specific area designated for asbestos abatement activity in which engineering control measures have been implemented to prevent the release of asbestos fibers to the atmosphere by means of: covering the walls, ceilings, and floors, and openings of such areas with polyethylene sheeting; establishing reduced atmospheric pressure within the area; and controlling personnel access to the area.

PP. Critical barrier: "Critical barrier" means a fiber-tight barrier within 15' (fifteen feet) of the regulated area and within the room(s) in which the project is conducted consisting of one layer of (six) 6-mil polyethylene sheeting, that is a separate layer from containment, used to seal windows (excluding fixed windows), doors, vents, drains, wall penetrations, and any other penetrations.

QQ. Cut: "Cut" means penetrate with a sharp-edged instrument, including sawing, but not including shearing, slicing, or punching.

RR. Decontamination facility or unit: "Decontamination facility or unit" means an enclosed area adjacent and connected to the containment consisting of, at a minimum, an equipment room, a shower room, and a clean room, that is used for the decontamination of workers, materials and equipment.

SS. Demolition: "Demolition" means the act or process of tearing down or razing a building or discrete portion thereof together with any associated handling operations, or the intentional burning of a building.

TT. Department: "Department" means the Maine Department of Environmental Protection composed of the Board and the Commissioner.

UU. Deteriorated: "Deteriorated" means the condition of a material in which the binding or matrix is losing or has lost its integrity so that the material is friable.

VV. Emergency asbestos abatement activity: "Emergency asbestos abatement activity" means an asbestos abatement activity necessitated by a sudden, unexpected event such as non-routine failures of equipment or by actions of fire and emergency medical personnel pursuant to duties within their official capacities.

WW. Employee: "Employee" means each person who may be permitted, required, or directed by an employer in consideration of direct or indirect gain or profit to engage in any employment.

XX. Employer: "Employer" means an individual, business entity, or public entity that gives an employee, whether directly or indirectly, gain or profit in exchange for performing any task.

YY. Encapsulant: "Encapsulant" means liquid sealant applied to ACM to reduce the tendency of ACM to release asbestos fibers.

ZZ. Encapsulation: "Encapsulation" means the application of a liquid sealant to ACM or the wrapping of ACM with rewettable cloth and mastic to reduce the tendency of the ACM to release asbestos fibers.

Note: Except for friable surfacing ACM, painting or sealing intact ACM in order to prevent damage or to enhance appearance is not an asbestos abatement (encapsulation) activity as long as the painting or sealing intact ACM will not damage the ACM.

AAA. Enclosure: "Enclosure" means the covering of ACM in, under, or behind any kind of fiber-tight barrier such as walls.

Note: Enclosing intact ACM in order to prevent damage or to enhance appearance is not asbestos abatement (enclosure) activity as long as enclosing the intact ACM will not damage the ACM.

BBB. Equipment room: "Equipment room" means an asbestos-contaminated room located within the decontamination facility or unit that is connected to both the containment and the shower, and supplied with impermeable bags or containers for the disposal of contaminated protective clothing, equipment and asbestos waste. The equipment room may or may not be part of a designated waste load-out unit.

CCC. Facility: "Facility" means an institutional, commercial, public, industrial, or residential structure, installation, or building or set of buildings at a single geographic location, including those containing condominium units, or individual dwelling units operated as a residential cooperative, military or company housing, or ship.

DDD. Friable ~~asbestos~~ ACM or friable asbestos: "Friable ~~asbestos~~ ACM" or "friable asbestos" means any ~~asbestos~~ ACM that, when dry, has the potential to readily release asbestos fibers when crumbled, pulverized, handled, deteriorated, or subjected to mechanical, physical or chemical processes. It also means potentially-friable ACM that has deteriorated or has been or will be processed to the extent that, when dry, it may readily release asbestos fibers. Sanding, cutting, abrading, or grinding are processes that will readily release asbestos fibers from potentially-friable ACM.

NoteOTE: Activities that render potentially friable asbestos-containing materials friable include but are not limited to: removal of: asbestos floor-tileing by an aggressive method, and subjecting asbestos-containing cementitious products and asbestos-containing latex, asphaltic or petroleum-based materials to sanding, grinding, abrading, or cutting with a mechanical cutter or to mechanical and/or physical forces such that the material is no longer intact, ~~other than exterior piping removed in whole pieces; and asbestos-containing roofing materials removed by mechanical (power) roof cutter.~~

EEE. Glove bag: "Glove bag" means a polyethylene bag, minimum (six) 6-mil in thickness or equivalent with built-in gloves that is used to remove ACM in small quantities.

FFF. Grind: "Grind" means to reduce to powder or small fragments using such methods as, but not limited to, mechanical chipping, grinding, drilling, or shot or bead blasting.

GGG. Gross visible debris: "Gross visible debris" means visible debris, other than dust, in the regulated area.

HHH. Handling: "Handling" means to lift, impact, dislodge, process, remove, store, or otherwise manipulate friable ACM.

III. HEPA: "HEPA" means high efficiency particulate air filter capable of retaining 0.3-micrometer diameter particles with 99.97% efficiency, including N-100, R-100, or P-100 filter cartridges.

JJJ. Homogenous area: "Homogenous area" means a discrete portion of surfacing material, thermal system insulation, or miscellaneous ACM that is uniform in color, texture, and composition.

KKK. In-house asbestos abatement unit: "In-house asbestos abatement unit" means an employee or group of employees of a Department licensed business or public entity that engages in, or intends to engage in, asbestos abatement ~~or associated activities~~ at projects solely within the confines of property owned or leased by the entity and that employs one or more asbestos abatement supervisors or other asbestos professionals.

This includes the sub-category of in-house asbestos identification and management unit for employees solely engaging in design, monitoring, and/or inspection activities.

LLL. In-house asbestos analytical laboratory: "In-house asbestos analytical laboratory" means a Department licensed asbestos analytical laboratory operated in-house that analyzes samples solely for in-house use and not for another individual, business, or public entity, or profit.

LLLMMM. Independent business relationship: "Independent business relationship" means a relationship between two businesses in which no financial or shareholder control is exerted by one over the other, except by contract to perform services for a specific project where the relationship between the contracting businesses is otherwise independent and the facility owner or agent is aware of the contractual relationship. Circumstances where a relationship between two businesses is not independent include, but are not limited to:

(i)* When a person and/or immediate family member or business entity has ownership shares in both businesses;

(ii)* When a person and/or immediate family member has ownership in, or serves as an officer, director, or employee of, one business and serves as an officer, director, or employee of the other business;

(iii)* When a person or business entity with ownership in, or serving as an officer, director, or employee of, one business has provided capital or other financial support to the other business; and

(iv)* When a person or business entity hires another person or business entity to conduct visual evaluation(s) and/or air clearance sampling using a fixed-price contract that does not fully compensate for additional sampling, analytical and labor costs necessitated by failure of the visual evaluation and/or air clearance sampling.

Note: The term "independent business relationship" is defined for purposes of the independence requirements at sections 2.G, 4.E(4)(a), 5.C(1)(c), and 8.A(1) and the financial interest disclosure requirements as sections 6.D(1) and 6.D(2).

MMMNNN. Inspection: "Inspection" means the process of visually identifying the locations, collecting bulk samples, and assessing the condition of suspect ACM present in or around a facility. This process includes sampling and assessing suspected ACM and creating records documenting the same. Inspection includes conducting a comprehensive building survey by a certified asbestos inspector prior to renovation and/or demolition activities to determine the presence of any asbestos-containing materials that may be impacted by the renovation and/or demolition project.

NNN000. Intact: "Intact" means that the ACM has not crumbled, been pulverized, or otherwise deteriorated so that the asbestos is no longer likely to be bound with its matrix.

000PPP. License: "License" means a document issued by the commissioner to a business entity or public entity affirming that the entity has met the requirements set forth in this rule to engage in asbestos abatement activities including but not limited to, asbestos abatement contractor, in-house asbestos abatement unit, asbestos consultant, asbestos analytical laboratory, and training provider.

PPPPQQ. Maine asbestos law: "Maine asbestos law" means 38 Maine Revised Statutes Annotated Sections 1271 to 1284.

QQQRRR. Mastic: "Mastic" means petroleum or asphalt based adhesive, glue, or protective coating used to adhere or fasten a product to a surface or to protect a surface from corrosion or decay. As used in this rule, mastic does not include surfacing materials or thermal system insulation.

RRRSSS. –Mechanical chipping: "Mechanical chipping" means grinding by machine or tool, including but not limited to ice scraper, spud bar, pry bar, and mechanical chipping machine.

SSSTTT. Miscellaneous ACM: "Miscellaneous ACM" means all ACM that is not surfacing material or thermal system insulation.

TTTTUU. Model Accreditation Plan (MAP): "Model accreditation plan" means Appendix C, the Interim Final Rule-59 FR 5236-5260 (effective April 4, 1994) to Subpart E of the Asbestos-Containing Materials in Schools rule, 40 CFR, Part 763 (effective December 14, 1987).

UUUVVV. Non-friable ACM: "Non-friable ACM" means ACM that is not friable ACM and is intact and not deteriorated. Non-friable ACM generally contains asbestos that is mixed into another medium or matrix such as vinyl or cement, and does not emit fibers readily unless deteriorated or subjected to sanding, cutting, grinding, or abrading.

VVVWWW. NVLAP: "NVLAP" means National Voluntary Laboratory Accreditation Program.

WWWXXX. OSHA: "OSHA" means the federal Occupational Safety and Health Administration.

XXXXYY. Owner or Operator: "Owner" or "operator" means any person who owns, leases, operates, controls, or supervises an asbestos abatement activity within a facility or who owns, leases, operates, controls, or supervises the facility at which an asbestos abatement activity occurs, or both.

YYYYZZ. PAT: "PAT" means Proficiency Analytical Testing, prescribed by AIHA to determine asbestos analytical laboratory or analyst proficiency.

ZZZAAAA. Person: "Person" means any individual, business entity, governmental body, or other public or private entity.

AAAABBBB. Physical barrier: "Physical barrier" means a partition utilized to prevent access into a regulated area by a person not associated with the project.

BBBB. Potentially Friable. "Potentially friable" means intact ACM that is not currently friable but will become friable if it is sanded, grinded, abraded or cut with a mechanical cutter or subject to mechanical/physical forces such that it is no longer intact.

CCCC. Project: "Project" means the asbestos abatement activities outlined in a project design, including any pre-cleaning and the hanging of polyethylene sheeting, that occur within a single building during a discrete and finite time period and with a lapse in abatement activity of no more than 10 working days.

DDDD. Project completion: "Project completion" means the end of all asbestos abatement activities in a regulated area.

EEEE. Project design: "Project design" means an asbestos-specific plan or any related or set of directions, work orders, bid documents or specifications developed by an asbestos abatement design consultant for the removal, enclosure, encapsulation handling, or repair of more than 3 square or 3 linear feet of ACM, or for the demolition or renovation of a facility or facility component which contains or impacts more than 3 square or 3 linear feet of ACM.

FFFF. Project monitoring: "Project monitoring" means an asbestos associated activity undertaken by an asbestos air monitor that documents whether an asbestos abatement activity is conducted and completed according to design specifications and applicable rules and regulations, or that performs area monitoring inside, outside, and/or adjacent to the regulated area in order to determine whether elevated fiber counts are being generated during a particular abatement activity.

GGGG. Public entity: "Public entity" means the state, any of its political subdivisions, or any agency or instrumentality of either.

HHHH. Regulated area: "Regulated area" means an area established by the owner or operator to demarcate the geographic boundaries where asbestos abatement activities take place. Whenever a work area containment is used, it demarcates the regulated area. Establishing the regulated area includes demarcation, pre-cleaning, hanging polyethylene sheeting, and any other activities which have the potential to disturb asbestos-containing materials at the site.

IIII. Remote decontamination facility or unit: "Remote decontamination facility" or "remote decontamination unit" means a decontamination facility or unit that is not contiguous with the regulated area, where negative air pressure is not required.

JJJJ. Removal: "Removal" means taking out ACM or facility components that contain or are covered with ACM from a facility.

KKKK. Renovation: "Renovation" means the removal of any asbestos-containing facility component(s) and/or building materials together with any related handling operations.

LLLL. Repair: "Repair" means an asbestos abatement activity that involves sealing, patching, and/or enclosure of damaged ACM.

MMMM. Responsible person: "Responsible person" means an individual having ultimate legal control of actions of a business entity, public entity, or employer, or such individual's agent.

NNNN. Sampling: "Sampling" means the process of obtaining representative portions of materials or air suspected to contain asbestos, including, but not limited to, the taking of bulk samples of materials, the collection of liquids, or the collection of air for the purposes of enumerating asbestos or fiber concentrations.

OOOO. Sand: "Sand" means to polish or rub off with sandpaper.

PPPP. Shower room: "Shower room" means a section of the decontamination facility or unit that has a shower equipped with continuous running, adjustable, hot and cold water, soap, and a mechanism of containing and collecting shower water that must be filtered with a 5 micron filter prior to discharge.

QQQQ. State: "State" means the State of Maine.

RRRR. Static Air Clearance Sample: Static air clearance sample means an air clearance sample that is collected from a regulated area that is not subjected to aggressive sampling.

SSSSRRRR. Surfacing material: "Surfacing material" means ACM that was sprayed-on, troweled-on, or otherwise applied to surfaces for acoustical, fireproofing, or other purposes.

TTTTSSSS. TEM: "TEM" means transmission electron microscopy.

UUUUTTTT. Thermal system insulation: "Thermal system insulation" means ACM that was applied to pipes, ducts, fittings, boilers, breaching, tanks, or other components to prevent heat loss or gain, or water condensation, or for other purposes.

VVVVUUUU. Training provider: "Training provider" means a person licensed by the Department to provide training that is necessary to fulfill certification or licensing requirements under this rule.

WWWWVVVV. US EPA: "US EPA" means the United States Environmental Protection Agency.

XXXXWWWW. Visible debris: "Visible debris" means any particulate residue, such as dust, dirt, or other extraneous material that may or may not contain asbestos, capable of detection by the human eye without the aid of instruments.

YYYYXXXX. Visible emission: "Visible emission" means any emission originating from ACM during abatement activities and capable of being detected by the human eye without the aid of instruments.

ZZZZYYYY. Visual evaluation: "Visual evaluation" means the process by which the regulated area is scrutinized by a certified asbestos air monitor to ascertain whether visible debris is present upon completion of an asbestos abatement activity.

AaZZZZ. Waste disposal site: "Waste disposal site" means a land area, facility, location, or combination of them, including landfills, utilized for final disposal of asbestos waste.

BbAa. Waste load out unit: "Waste load out unit" means part of a containment through which asbestos waste or asbestos-contaminated material or supplies is removed from the regulated area. Waste load-out units shall be equipped with an air-lock contiguous with the containment to allow cleaning and packaging of waste.

CcBb. Work area: "Work area" means any physical space within the regulated area in which an asbestos abatement activity is being performed.

DdCc. Work practices: "Work practices" means the minimum standards, procedures, or actions taken or used in carrying out any asbestos abatement activity.

EeDd. Work site: "Work site" means the geographic location, as indicated by street address, at which an asbestos abatement activity takes place.

2. General Provisions.

A. Applicability. These rules and regulations apply to asbestos abatement activities, including removal, encapsulation, demolition, enclosure, repair, and handling, and associated activities such as inspection, design, analysis, monitoring, and training, conducted in the State of Maine.

B. Relationships to Other Rules. Disposal of asbestos and asbestos-containing material is governed by Maine's *Landfill, Siting, Design and Operation Rule, 06-096 CMR 401* (as amended September 6, 1999). Transportation of asbestos or asbestos-containing waste material is governed by Maine's *Transportation of Hazardous Materials Rule, 16-21922 CMR 60*, (effective July 27, 2010 September 28, 1984 as amended) as administered by the Maine Department of Public Safety.

C.C. Right of Entry. Employees and agents of the Department may enter any property at reasonable hours and enter any building with the consent of the property owner or operator, occupant or agent, or pursuant to an administrative search warrant, in order to inspect the property or structure, take samples or conduct tests as appropriate to determine compliance with any asbestos laws and regulations administered by the Department or the terms and conditions of any order, license, permit, approval or decision of the Commissioner or the Board.

D.D. Prohibition. No person or owner or operator may engage in, or arrange for, any asbestos abatement activities in Maine unless the asbestos abatement activity is performed by licensed entities and certified professionals, notification is provided to the Department, and the appropriate work practice standards are followed, in accordance with this rule.

E.E. Exemptions.

- (1) The disposal of asbestos waste or other asbestos abatement activity related to disposal at a site licensed to accept asbestos waste for disposal is exempt from this rule.
- (2) Persons undertaking asbestos abatement activities in single-unit residential buildings are exempt from the licensing and certification requirements of these rules provided that the activities are limited to heating equipment and performed by persons licensed by the Oil and Solid Fuel Board under Title 32, chapter 33, to install, repair, remove, or service heating equipment. These persons must comply with the notification, work practices, and other requirements of these rules.

F.F. Activities Not Subject to This Rule. The following activities are not subject to this rule:

Note: While the activities delineated below are not subject to this rule, they are subject to the following regulations:

Federal OSHA General and Construction Standards apply to all of the removal/containerization activities listed below; removal requirements include, but are not limited, work practice and engineering controls. Containerization requirements include placing asbestos waste in leak-proof containers. OSHA regulations apply whenever a business entity employs individuals for compensation (homeowners are not subject to OSHA's regulations). Please contact OSHA for information on how to comply with their standards.

The Federal Asbestos in Schools Rule (commonly referred to as AHERA) contains specific requirements for all asbestos-related activities that take place in public schools including but not limited to, training requirement for school personnel that disturb asbestos. School personnel need to check with the school's Designated Person before undertaking any asbestos-related activities.

The transportation of asbestos-containing materials is governed by Maine's *Non-Hazardous Waste Transporter Licenses* 06-096 CMR Ch 411. This rule requires that businesses that transport asbestos-containing material be licensed by the Department before doing so.

The disposal of asbestos-containing materials in Maine is governed by Maine's *Landfill Siting, Design, and Operation Rule*, 06-096 CMR Chapter 401.

Note: Please contact the DEP Asbestos Hazard Prevention Program at (207)287-2651 to receive information on how to perform the activities listed below safely and how not to become subject to the requirements of Chapter 425, Asbestos Management Regulations.

- (1) The removal and containerization of ~~asphaltic or petroleum-based~~ intact asbestos-containing latex, asphaltic or petroleum-based roofing materials, including but not limited to mastics, glues, cements, sealants, coatings, and adhesives provided they are not sanded, grinded, abraded or cut with a mechanical roof-cutter.

Note: ~~OTE:~~ The use of bead or shot blasting equipment ~~constitutes~~ is considered grinding and is therefore a regulated activity. Scraping and scrubbing asbestos-containing asphaltic or petroleum-based materials of mastics ~~are~~ is not considered sanding, cutting, grinding or abrading.

Note The work practice requirements for the removal and containerization of greater than three square feet of asbestos-containing latex, asphaltic or petroleum-based materials that are sanded, grinded, abraded are set forth in Section 7(D). The work practice requirements for the removal and containerization of more than 105 square feet asbestos-containing latex, asphaltic or petroleum-based materials that are cut with mechanical roof cutters are set forth in Section 7(D); performing these activities requires licensure as an asbestos abatement contractor.

- (2) ~~(2)~~ The removal and containerization of exterior asbestos-containing cementitious products such as exterior siding at owner-occupied single family residential units when performed by the homeowner.

Note: Homeowners should contact the DEP Asbestos Hazard Prevention Program at (207)287-2651 to receive information on how to safely perform this activity. If you live in a single-family home that you own and want someone else to remove your asbestos siding for you, you must hire a licensed asbestos abatement contractor. The removal of asbestos siding from multi-family dwellings and commercial buildings must be done by a Maine-licensed asbestos abatement contractor.

- (3) The removal and containerization of intact asbestos-containing cementitious piping and electrical conduits provided they are not sanded, grinded, abraded or cut with a mechanical cutter. Each section must be removed using best management practices such that a minimum amount of breakage occurs during the initial removal of fasteners, other attaching system or decoupling, and the product remains intact throughout the remainder of the removal and containerization process.

Note: The work practice requirements for the removal and containerization of greater than three square feet of other asbestos-containing cementitious materials not listed above

and for asbestos-containing piping and electrical conduits that are sanded, grinded, abraded or mechanical cutter are set forth in Section 7(D); performing these activities requires licensure as an asbestos abatement contractor.

- (34) The removal and containerization of intact exterior-asbestos-containing caulking or glazing.

Note: The work practice requirements for the removal and containerization of intact asbestos-containing caulking or glazing that are sanded, grinded, abraded or cut with a mechanical cutter are set forth in Section 7(A); performing these activities requires licensure as an asbestos abatement contractor.

- (45) The removal and containerization of asbestos-containing joint compound used to fill nail holes and tape seams in building component systems including but not limited to walls and ceilings.

NoteOTE: Joint compound used as a layered system on walls, ceilings, etc., is not exempt.

- (6) The removal and containerization of asbestos-containing gaskets when the gasket itself is encased by a facility component and will not be disturbed or impacted by the operation.

NoteOTE: An example of this type of operation would be removal of a flange gasket by cutting or removing the piping on either side of the flange.

~~(iii)(67)~~ The removal and containerization of intact asbestos-containing flooring-tiles except for felt-backed sheet flooring products, in a non-aggressive method, using infrared tile lift machine or heat guns, where each-the flooring-tile is removed in a sufficiently heated state whereby the intact flooring-tile comes up whole.

Note: Removing asbestos-containing flooring products with an ice scraper is an aggressive removal method and therefore subject to the work practice requirements set forth in Section 7; performing this activity requires licensure as an asbestos abatement contractor.

Note:— Many vinyl sheet floor covering products have a felt back layering to them; asbestos fibers are present in the layering. The felt is readily visible on the back side of the flooring product. The layers can separate during the removal process thereby releasing asbestos fibers; using infrared heat or heat guns to loosen the product from the substrate may not prevent this (layer separation) from occurring.

78. 8.—Lifting and moving no more than two intact (2'x4') asbestos-containing suspended ceiling tiles per room to adjacent ceiling tiles and later resetting them back in place in order to perform routine building maintenance activities above the suspended ceiling system.

NOTE: Disposal of non friable asbestos-containing materials, including floor tiles, is governed by Maine's *Landfilling, Siting, Design, and Operation Rule*, 06-096 CMR Chapter 401 (September 6, 1999).

~~(5)(89)~~ Owners collecting samples of asbestos-containing latex, asphaltic or petroleum-based materials, flooring and cementitious non friable materials that potentially contain asbestos in their own owner-occupied single-family residence.

G.G. Conflict of Interest

Visual evaluations and air clearances for an asbestos abatement project involving more than 100 linear/~~and/or~~ square feet, or any combination thereof, of ACM must be performed by an asbestos consultant firm. The asbestos consultant firm must have an independent business relationship with the asbestos abatement contractor or asbestos in-house abatement unit performing the abatement, except as provided in sections 7.D(1)(l) and 7.D(2)(g) of this rule.

Note: A Maine-licensed asbestos abatement contractor may conduct the required visual evaluation and air clearance sampling for an asbestos abatement project under their contractual control that involves less than 100 linear/square feet, or any combination thereof, of ACM provided the individual conducting visual the evaluation and air clearance sampling is a Maine-certified Asbestos Air Monitor.

3. Notification Requirements

- A. Applicability.** The notification requirements established by this section apply to all asbestos abatement projects except asbestos associated activities. Demolition activities, excluding single family residential dwellings, are also subject to the notification provisions of this section [see sections 3.B.(3)(m) and (n), and 3.C(3) of this rule].

Note~~OTE~~: Notification requirements are designed to provide the Department with adequate information to effectively schedule compliance inspections.

B. General Requirements

- (1) Unless exempted, any person, owner, or operator engaging in the removal repair, demolition, enclosure, encapsulation, or handling of more than three linear or square feet of an asbestos-containing material must submit written notification of each asbestos project to the Department. The person, owner, or operator is responsible for ensuring that the complete notification including any applicable fee, is postmarked at least 10 calendar days, or received by the Department at least 5 working days, prior to commencement of the asbestos abatement project, including establishing the regulated area. Delivery of the notification by US Postal Service, commercial delivery service, hand delivery, or other method as approved by the Department is acceptable. Alternative notification procedures, including those listed below, as well as notification of demolitions when no asbestos remains in the building as evidenced by an inspection or complete abatement, may be used.

Note~~OTE~~: The start date on the notification should encompass the set-up of the regulated area, including any pre-cleaning and the hanging of polyethylene sheeting.

- (2) Notification must be on forms approved by the Department, must include all required information under this section, must be accompanied by the appropriate fee, and must be typewritten or easily legible. An incomplete notification is not acceptable and therefore not of record.

(3) The following information must be included in full in the notification:

- (a) A clear indication of whether the notification is the original or a revised notification;
- (b) The name, address, and telephone number of the following:
 - (i) The building owner or operator; and
 - (ii) The asbestos abatement contractor that will perform the asbestos abatement project;
- (c) An indication of the type of operation (for example, demolition, renovation, repair, etc.);
- (d) A clear description of the building or affected part of the building including the size (square feet and number of floors), age, and present and prior use of the building;
- (e) The procedure, including analytical methods, that will be utilized to detect the presence of asbestos material;
- (f) The specific amount of ACM to be abated from the building in terms of length of pipe in linear feet or surface area in square feet;

Note: All other asbestos-containing materials except for linear lengths of piping must be quantified in square footage.

- (g) The building address, including building name, number, and floor or room number of the work area in which the asbestos abatement project will take place, as applicable;
- (h) Scheduled starting and ending dates of the asbestos abatement project (encompassing setup, removal, clearance, and tear down dates);
- (i) Scheduled work hours, including planned shift work;
- (j) A clear description of demolition, renovation, repair, or other work to be performed and method(s) to be utilized, including specific techniques to be utilized and a clear description of affected components;
- (k) A clear description of work practices and engineering controls to be used to comply with the requirements of this rule;

NOTE: Removal techniques must be specified for resilient floor covering removals.

- (l) The name and location of the waste disposal site at which the asbestos waste will be disposed of;
- (m) For a building which is structurally unsound, in danger of collapse, and scheduled to be demolished, the name, title, and authority of the State or local government representative who has ordered the demolition, and the professional engineer who determined that the structure is structurally unsound, the date on which the order was issued, and the date on which the demolition was ordered to begin, along with a copy of that order;

- (n) For any other building scheduled for demolition, the dates the demolition is scheduled to occur;
- (o) For an emergency asbestos abatement project, the date and hour on which the emergency occurred and a description of the emergency;
- (p) The name, address, and telephone number of the transporter scheduled to remove asbestos waste from the site;
- ~~(q) A description of any standard variance(s) to work practice procedures as allowed in these regulations, including a description of the conditions that necessitate the use of the standard variance;~~
- (q) A request for approval of any non-standard work practice(s) variance to work practice procedures, including the justification for the variance request;
- ~~(r) and~~
- (r) Name of the asbestos abatement design consultant who prepared the original project design for the project.
- ~~(s)~~(s) A contractor or consultant job number consisting of a 2-3 letter company identifier assigned by the Department plus any combination of up to 7 letters and digits.
- ~~(t)~~(t) Dates of actual removal/repair activities;

Items (b)(ii), (l), and/or (p) in this paragraph may be noted as unknown on the original notification but must be provided to the Department on a revised notification submitted in accordance with section 3.D(2) below. Item (t) may be updated at a minimum 24 hours prior to the new start date for actual removals by telephone contact with Department staff, by fax, or by other methods approved by the Department.

- (4) Notification of an asbestos abatement project must be accompanied by a non-refundable fee paid in full by a cashier's, certified or company check made payable to the Maine Environmental Protection Fund, or other Department-approved method, in the appropriate amount as follows:
 - (a) For projects involving more than 100 square feet or 100 linear feet of ACM or any combination thereof, but less than 5001,000 square or 52,500 linear feet of ACM: \$100.
 - (b) For projects involving more than 500 square feet or 2,500 linear feet of ACM, but less than 1,000 square or 5,000 linear feet of ACM: \$150.
 - ~~(c)~~(b) For projects involving more than 1,000 square feet or 5,000 linear feet of ACM, or any combination thereof of ACM: \$2300.
 - ~~(e)~~(d) For asbestos abatement activities at facilities for which an annual facility notification has been submitted, fees as per (a) & (b) above per project. Fees shall~~may~~ be submitted on a quarterly basis.

(d)(e) Fees for condominium units, and individual dwelling units operated as a residential cooperative or military or company housing shall have an annual cap of \$5,000. Fees may be submitted on a quarterly basis.

Note: If there are not sufficient funds to cover the check or credit card transaction an insufficient funds fee will be assessed by the Department in accordance with State of Maine laws and policies. Until that insufficiency is resolved (by money order or bank check), the Department will not accept any additional checks or credit card transactions from the party including additional checks for other project notifications.

(f) Notification fees are not required for asbestos abatement projects occurring in a single-unit residential building.

C. Alternative Notification Procedures. Alternative notification procedures must be followed in the following cases:

- (1) Emergency Notification. In the case of an emergency asbestos abatement activity or an ordered demolition of an unsound structure by a State or local authority:
 - (a) Oral notification, explaining the event and indicating the need to conduct an asbestos abatement activity, must be made by telephone within one working day of the emergency; and
 - (b) Written notification, explaining why the activity qualifies as an emergency and what asbestos abatement activity(ies) will be conducted [including the information required by section 3.B(3) of this rule], must be sent by facsimile transmission, hand delivery, or other method approved by the Department so that it is received by the Department as soon as possible, but no later than 72 hours after the emergency. The fee for the emergency project shall be received no later than 3 days after the emergency notification is submitted. If the notification fee for an emergency project is not received within 72 hours, the Department will not accept any additional project notifications, license/certification applications or renewals from the business entity until the emergency notification fee is received by the Department.

Note~~OTE~~: The Department considers it possible to submit written emergency notification within 24 hours after an emergency in virtually all instances. Department fax machines operate 24 hours per day, 7 days per week.

- (2) Annual Facility Notification. A facility may notify the Department of asbestos abatement projects on an annual basis. Notification shall be building specific and include the following in addition to the standard notification information required in by section 4.B(3):
 - (a) a facility diagram including all buildings in which asbestos abatement projects may take place;
 - (b) a description of written method to be used to communicate project dates to the Department at least 24 hours prior to the start of each project;

- (c) a description of the method that ensures that separate standard notification is sent for each abatement project involving more than 160 square feet or 260 linear feet of asbestos-containing material and not forecasted per section 3.C(2)(b) of this rule;
 - (d) a description of the method or a copy of the form that will be sent to the Department quarterly (calendar year) and that compiles a list of all projects completed and payment of corresponding fees; and
 - (e) a description of the method(s) that will be used to ensure that ~~standard variances are received no later than 24 hours prior to the project and that non-standard work practices~~ variances are not implemented prior to receipt of Department approval.
- (3) Demolition of Buildings. The demolition of buildings that contain asbestos must be notified as part of the asbestos abatement project notification [see sections 3.B(3)(m) and (n) above]. For the demolition of buildings where it can be demonstrated that no asbestos-containing material is in or on the building, the owner or operator shall notify using alternative forms approved by the Department. Single-family residential buildings are exempt from this notification requirement.

NoteOTE: Intact, non-deteriorated asbestos containing packings, gaskets, resilient floor covering, and asphalt roofing products do not need to be removed from the building prior to demolition if the demolition is performed using large equipment in accordance with the provisions of section 7.B(3) of this rule.

(4)(4) Other Notification Timeframe Waiver- Notification for asbestos abatement projects for which the Department approves a notification period less than that required in section 3.B(1) above must be received by the Department as soon as possible, but no later than 24 hours prior to commencement of the asbestos abatement project, including set-up or on-site preparation activities. Delivery of the notification by US Postal Service, facsimile (fax), commercial delivery service, hand delivery, or other method as approved by the Department is acceptable. To be eligible for this provision, the building owner must demonstrate that reasonable planning and foresight could not have predicted the event and that another notification procedure outlined in these rules would not suffice to protect public health and the environment had it been properly executed. Examples include, but are not limited to, discovering additional asbestos-containing material during a renovation or demolition activity for which a renovation or demolition inspection for asbestos was conducted (e.g., within a wall cavity or plumbing chase), a public health threat exists or will develop if the project is not initiated within a very limited timeframe (e.g. clean up following a fiber release episode), or conducting a removal project necessitated by an unforeseeable circumstance (e.g., boiler and associated piping/valves failure). The fee for a Notification Timeframe Waiver project shall be received no later than 3 days after the emergency notification is submitted. If the notification fee for an emergency project is not received within 3 days, the Department will not accept any additional project notifications, license/certification applications or renewals from the business entity until the emergency notification fee is received by the Department.

D. Notification Revision Procedures

(1) Notification date changes shall be made as follows:

- (a) If the project will begin on a date earlier than the original start date, the owner or operator must submit to the Department a new or revised notification that meets the requirements of section 3.B(3) of this rule. This notification must be postmarked at least 10 days prior, or be received by the Department at least 5 working days prior, to the new start date. Delivery by US Postal Service, commercial delivery service, hand delivery, or other method approved by the Department is acceptable.
- (b) If the project will begin later, or end earlier or later, than the dates set forth in the original notification, the owner or operator must ensure that the Department receives a new written notification detailing the change(s) in date(s) as soon as possible before, but not later than 24 hours prior to, the original start or actual end date, as applicable. Delivery by US Postal Service, commercial delivery service, facsimile transmission, hand delivery, or other method approved by the Department is acceptable.

- (2) A revised notification form must be sent to the Department for any change(s) to the notification information detailed in section 3.B(3) of this rule, including a change of greater than 20% or by more than 100 linear or square feet of the amount(s) of ACM to be affected, whichever is lesser. Delivery may be made by US Postal Service, commercial delivery service, facsimile transmission, hand delivery, or other method approved by the Department, provided it is received by the Department at least 24 hours prior to the change and prior to completion of the project, except that notification of changes to any non-standard work practice variances must be received at least 5 working days prior to implementation of the work practice variance unless the Department approves a shorter timeframe in accordance with the notification provisions of section 3.C(4) of this rule. Non-standard work practice variances may not be implemented without written approval from the Department. Applicable fees Any fee increase for a revised project notification, where applicable, shall be submitted with the notification and Clearances are required for projects exceeding 100 linear or square feet, or any combination thereof, including the change.

4. License Requirements for Business and Public Entities**A. General License Requirements**

- (1) Scope. This section sets forth the specific licenses that a business or public entity must obtain prior to engaging in an asbestos abatement activity. This section also sets forth the general standards of conduct and specific recordkeeping and other requirements for maintaining each type of license.
 - (a) A business entity or public entity that engages in an asbestos abatement activity regulated by this rule must hold a valid license as set forth in this section, unless exempted under section 2.E(2) of this rule.
 - (b) A business entity or public entity that engages in an asbestos abatement activity in more than one licensing category set forth in this section must hold a valid license in each such category.
 - (c) An individual engaged in asbestos activities regulated by this rule as a sole proprietor must hold both a valid license and a valid certificate, ~~as appropriate.~~

- (d) A business entity or public entity licensed pursuant to this section must ensure and document that is responsible for ensuring and documenting that each of its employees is trained in, knowledgeable of, and complies with company-specific standard operating procedures and that meet the requirements of this rule, as applicable.
 - (e) A business or public entity must maintain all required records at their place of business and must make these available to the Department within 24 hours of request. The business or public entity must also have a written plan for maintaining and archiving records, including provisions for records to be retained for seven (7) years, even if the licensee ceases business operations.
- (2) Standards of Conduct. Licensees must comply with all State and federal laws and regulations pertaining to asbestos abatement activities, including the conflict of interest provisions of section 2.G of this rule. Failure to comply with this rule may result in suspension or revocation of a license, denial of an application for renewal, or other enforcement action deemed appropriate by the Department. Licensees must perform their activities in a manner that:
- (a) Is ~~substantially in compliance with state-of-the-art professional services generally recognized as acceptable by the asbestos consulting and abatement industries, asbestos professional associations, and government agencies;~~
 - (b) Is consistent compatible with current practices taught by Department-licensed Training Providers; and
 - (c) Based on principles, values, standards, or rules of behavior that guide the decisions, procedures and practices of a licensed entity in a way that contributes to the health and safety of his/her workplace and to all others who may be affected by his/her work.
 - ~~(b) Provides the on-site supervisor with the authority to direct the correction of problems when encountered and terminate activity if needed to prevent the release of asbestos fibers.~~
- (3) General Application Requirements and Procedures
- (a) An application for a license (including renewal) must be made on forms approved by the Department and must be accompanied by any necessary documentation demonstrating that the ~~substantive~~ licensing requirements of this section have been met.
 - (b) An application must be submitted with a non-refundable application fee paid in full by a cashier's, certified, or company check or other Department-approved payment methods in the amount set forth in this section.
 - (c) If an application is incomplete, the Department will either deny it or ask for further information.
 - (d) If the Department requests further information from an applicant and does not receive it in full within ~~630~~ calendar days, the application will be denied.
 - (e) If the Department, after reviewing an application, determines that the applicant has met the applicable requirements of this section, the Department will approve the application

and a license will be issued to the business entity or public entity stating the category in which the entity holds a valid license.

- (f) Except as provided at section 4.A(4)(c) of this rule, an expired license prohibits the business entity or public entity to which it is issued from engaging in the asbestos abatement activity until a current license is obtained.

(4) Annual Renewal and Reapplication Procedures.

- (a) A license shall expire one year from the date of issuance, except that licenses issued in response to an application submitted within ~~630~~ days after the expiration date of a previously issued license will expire one year from the expiration date of the previously issued license.
- (b) An applicant may not apply for renewal of a license that has expired more than ~~630~~ days.
- (c) If a complete application for renewal of a license is received at least 30 calendar days prior to expiration of the license, the license sought to be renewed will not expire until a final decision has been made by the Department. If a complete application for renewal of a license is not received at least 30 calendar days prior to expiration of the license, the license sought to be renewed will expire until a final decision has been made by the Department.
- (d) If an application has been denied under this section, the application may be resubmitted only if the applicant ~~adequately addresses in writing each deficiency reason given for~~ the denial.

(5) Denial of Applications. The Department shall deny an application for a license (including renewal) if the applicant fails to meet the standards established by this rule. Reasons for denial include, but are not limited to:

- (a) Failure to submit documentation demonstrating its ability to comply ~~fully~~ with applicable requirements, procedures, and standards set forth in this rule;
- (b) Its employees' or agents' history of incompetence or negligence as determined by the Department based on (a) previous compliance inspection(s), review of operating record(s), or other documents;
- (c) Submission of false information on an application;
- (d) Submission of an incomplete application;
- (e) Failure to submit the required fee; or
- (f) Past violation(s) of State or federal laws or regulations pertaining to asbestos abatement activities or asbestos associated activities.

When issuing a denial, the Department may specify a time period not to exceed one year in which the applicant may not re-apply for licensure.

(6) Retention of Records. Records required by this section shall be maintained for at least seven years. Records shall be stored at the licensee's normal place of business or an archive or other facility approved by the Department.

- (7) Fees. License applications must be accompanied by a non-refundable fee paid in full by a cashier's, certified, or company check or other Department-accepted method, made payable to the Maine Environmental Protection Fund, as follows:

(a) Asbestos Abatement Contractor: \$~~2~~650.00

Limited license subcategories include:

- (i) Asbestos-containing exterior Siding ~~and cementitious materials~~
- (ii) Roofing including transite roof shingles
- (iii) Demolition by Large Equipment

~~(b) In-house Asbestos Abatement Unit: \$250.00~~

Subcategory includes:

~~(i) In-house Asbestos Identification and Management Unit~~

(~~e~~b) Asbestos Consultant: \$~~2~~650.00

Subcategories include:

- (i) Monitoring
- (ii) Inspection
- (iii) Design

(~~c~~d) Asbestos Analytical Laboratory: \$~~25~~4000.00

(d) In house Asbestos Abatement Unit: \$650.00

(e) Training Provider: \$500.00 or, with prior written ~~upon~~ Department approval, the equivalent value of training of Department personnel.

Note: If there are not sufficient funds to cover the check or credit card transaction an insufficient funds fee will be assessed by the Department in accordance with State of Maine laws and policies. Until that insufficiency is resolved (by money order or bank check only), the Department will not accept any additional checks or credit card transactions from the party including checks associated with project notifications.

B. Asbestos Abatement Contractor

(1) License Requirements

- (a) A business entity engaged in an asbestos abatement activity must hold a valid Asbestos Abatement Contractor license unless exempted under the provisions of section 2.E(2) of this rule.

Note~~OFE~~: Some activities that may require a valid Asbestos Abatement Contractor license are electric, electronic, plumbing, roofing, siding, flooring, heating, carpentry, masonry, and HVAC activities.

- (b) A licensed Asbestos Abatement Contractor engaged in an asbestos abatement activity under its contractual control is not required to hold an Asbestos Consultant license to design, monitor, or collect air samples if performed by an appropriately-certified asbestos professional in conjunction with an asbestos abatement activity.

(2) Personnel Requirements

- (a) A licensed Asbestos Abatement Contractor must have a certified Asbestos Abatement Project Supervisor employed on staff at all times, except that a Limited Asbestos Abatement Contractor may meet this personnel requirement by subcontracting with an Asbestos Project Supervisor, Asbestos Abatement Design Consultant or Asbestos Air Monitor services.

- (b) Employees of licensed Asbestos Abatement Contractors who engage in asbestos abatement or associated activities must be certified pursuant to this rule ~~as appropriate~~.

- (3) Limited Asbestos Abatement Contractor License. The Department may issue a limited license to an Asbestos Abatement Contractor to engage solely in removal of ACM roofing including transite roof shingles, ~~or exterior ACM cementitious materials~~ siding activities, or demolition by large equipment with intact ACM flooring.

- (4) Application Requirements. An applicant for Asbestos Abatement Contractor including Limited Licenses must submit information ~~sufficient~~ to demonstrate that it meets the requirements of this section and the following:

- (a) A written worker protection program, including a respiratory protection program that conforms with the requirements of OSHA's Respiratory Protection Standard 29 CFR 1910.134, (effective April 8, 1998);
- (b) A medical monitoring program that conforms to the requirements of OSHA's Asbestos Standard for Construction (29 CFR 1926.1101 effective August 10, 1994), which includes the identity of the occupational health clinic utilized, number of employees enrolled in the program, and locations of employee exposure records;
- (c) A list of all asbestos associated citations and notices of violation received in the United States during the last ~~two~~five years including the name of the issuing agency or department, the final disposition of such citation or notice, and, if the applicant's principal owner or operator or officer has received an asbestos associated citation or notice while owning or operating another company in the previous ~~five~~two years, a list of those violations;
- (d) A list of states in which the applicant holds a license, certification, accreditation, or any other approval for asbestos abatement activity;
- (e) A copy of the applicant's standard operating procedures for abatement activities that prevent contamination ~~or recontamination of a facility and the environment~~, and that protect the public and employee health from the hazards of exposure to asbestos;

including a clear description of procedures to be followed if unexpected ACM is found, or if previously intact, stable ACM becomes friable during handling; Limited licensees must submit standard operating procedures specific to their activities. Roofing firms who intend to remove transite shingles must submit a specific operating procedure for transite shingle removal.

- (f) A copy of the contractor's form for sign-off, by an owner or owner's agent, acknowledging receipt of bulk sampling and project monitoring disclosures;
- (g) Proof of access to a licensed asbestos disposal site;
- (h) Proof that the applicant's employees engaged in asbestos abatement activities are certified pursuant to the requirements of this rule;
- (i) A list of the names of the applicant's owner(s), or operator(s), principal(s), and officer(s);
- (j) A list of all other entities performing asbestos abatement activities or asbestos associated activities of which the applicant, owner or operator(s), principals, or officers are an owner or operator, principal or officer;
- (k) A list of all names (or acronyms) by which the applicant's firm is known or under which it does business;
- (l) Any information requested by the Department for purposes of determining the proficiency and adequacy of the applicant's standard operating procedures;
- (m) Proof that at least one employee is a certified Asbestos Abatement Project Supervisor or trained as a competent person for roofing, flooring, exterior cementitious, and demolition by large equipment projects; and
- (n) A statement affirming that applicable state asbestos rules and regulations, including the recordkeeping requirements of these rules, will be met.

(5) Recordkeeping Requirements

- (a) An Asbestos Abatement Contractor must maintain documents set forth under this section at its principal place of business or at an archive facility approved in advance by the Department, in a form that is easily retrievable by project.
- (b) An Asbestos Abatement Contractor must make the following documents available to the Department within 24 hours of request:
 - (i) The name, address, and Department certification number for each of its employees engaged in asbestos abatement activities, including dates of employment;
 - (ii) Identification, by name and Department certification number, of each employee's involvement in each of the Asbestos Abatement Contractor's past and present asbestos abatement projects, including name, address, location, and duration of the project;
 - (iii) Copies of all correspondence between the Asbestos Abatement Contractor or its agent and any asbestos regulatory agency including OSHA, for the previous five

seven years, including but not limited to letters, notices, citations received, and any notifications made by the contractor pursuant to this rule;

(iv) Copies of all project waste manifests required by the federal NESHAP regulations and Maine's *Non-Hazardous Waste Transporter Licenses* 06-096 CMR Ch 411. Documents including, but not limited to, receipts showing dates, locations, and amounts of asbestos waste involved, the identification of the source of the asbestos waste, the disposal site, and the transporter;

~~(v)(v)~~—Copies of Asbestos Consultants' and Asbestos Analytical Laboratories' reports regarding the project design, on-site project monitoring records, and release of the regulated area including documenting the successful completion of the visual evaluation and air clearance sampling requirements~~inspection, design, and anal~~

ysis; and

(vii) Individual project records specified below.

(c) An Asbestos Abatement Contractor must maintain the following items at the abatement work site throughout the duration of such activity and must make the documents immediately available to the Department upon request:

(i) A copy of Chapter 425, "Asbestos Management Regulations";

(ii) A copy of the site-specific asbestos abatement project design;

~~(iii)~~ A listing of all employees, by name, social security number, and Department certification number, assigned to the project;

~~(iv)~~ A listing of each of the subcontractors involved in the asbestos portion of the project;

~~(v)(iii)~~ A Department certification card for each on-site employee;

~~(iv)~~ ~~(vi)~~ A daily sign-in/out log identifying each employee involved in the project by name and Department certification number, including the length of time each spent on the project;;

Note: OSHA requires that you also maintain a daily containment log showing time of entry and egress into the regulated area.

(vii) Records of all on-site monitoring, including personal samples required by 29 CFR 1926.1101, and project documentation;

(viii) A copy of the project notification;

~~(vix)~~ A copy of the Department approval for any non-standard work practice variance granted in accordance with these regulations; and

~~(xviii)~~ A copy of the form signed by the building owner or owner's agent acknowledging receipt of the bulk sampling and/or project monitoring disclosures.

CD. Asbestos Consultant

- (1) License Requirement. A business or public entity that engages in the inspection, design, or monitoring of asbestos abatement activities must hold a valid Asbestos Consultant license. Licenses shall specify the function performed.
- (2) Personnel Requirements
 - (a) The Asbestos Consultant firm must have an Asbestos Abatement Design Consultant, Asbestos Inspector, or Asbestos Air Monitor on staff at all times, as applicable for the type(s) of services for which they are licensed.
 - (b) Each employee of an Asbestos Consultant that engages in the inspection, project design, or monitoring of asbestos abatement activities must be certified pursuant to these rules.
- (3) Application Requirements. An applicant for an Asbestos Consultant license must submit sufficient information to demonstrate that he/she meets the general license requirements set forth in this section and the application requirements of Asbestos Abatement Contractor, except that at least one employee must be certified as an Asbestos Inspector if the firm engages in inspection activities, at least one employee must be certified as a Asbestos Design Consultant if the firm engages in project design activities, and at least one employee must be certified as an Asbestos Air Monitor if the firm engages in air monitoring activities.
- (4) Recordkeeping Requirements
 - (a) An Asbestos Consultant is subject to the following contractor recordkeeping requirements, 4.B(5)(a-b)(i-v), and 4.B(5)(c)(iii-vi) to the extent applicable to design, inspection, disclosure, and monitoring, and as further described in sections 4.D(4)(b) through (d) of this rule.
 - (b) An Asbestos Consultant must maintain copies of daily project logs. Past project logs must be maintained at the principal place of business. Current project logs must be kept up-to-date at the project work site. Project logs include, but are not limited to, sign-in sheets, daily project records, monitoring procedures and data, notifications, work practices associated with the asbestos activity, updated project designs indicating any changes made, and non-standard work practice(s) variances.
 - (c) An Asbestos Consultant must maintain the following records at his/her place of business and make them available within 24 hours of request:
 - (i) The documents listed in the on-site contractor recordkeeping requirements of these rules as applicable to project monitoring;
 - (ii) Copies of laboratory reports, monitoring documents, and other project documents that may be generated for a particular activity;
 - (iii) Copies of all design documents for each activity;
 - (iv) Copies of standard operating procedures for each activity performed on-site by the Asbestos Consultant; and

- (v) Copies of any other documents generated in the course of each asbestos abatement activity.
- (d) An Asbestos Consultant must maintain the following documents at the work site:
 - (i) The documents listed in this section;
 - (ii) Current project logs specified above; and
 - ~~B.~~(iii) A copy of the form signed by the building owner or owner's agent acknowledging receipt of bulk sampling and/or project monitoring disclosures.

~~(e)~~(e) An Asbestos Consultant shall provide a paper copy of each three-year reinspection and management plan recommendation report conducted in accordance with the requirements of AHERA to the Local Education Agency (LEA) and the State of Maine Bureau of General Services[BGS] (77 SHS Augusta, ME 04333-0017) within 960 days of completion of each reinspection. The Asbestos Consultant shall notify the Department in writing of the reinspection date and the date the report was sent to the LEA and BGS when the reports are submitted the LEA and BGS.

E. Asbestos Analytical Laboratory

- (1) License Requirement. A business or public entity that qualitatively or quantitatively analyzes samples of solids, liquids, or gases for asbestos fibers, or that analyzes air samples for total fiber count, must be licensed as follows:
 - (a) An Asbestos Analytical Laboratory performing asbestos bulk, and/or air analysis of samples collected generated in the State of Maine must hold a valid license for the type of service provided.
 - (b) An Asbestos Analytical Laboratory whose license encompasses air analysis must use phase contrast microscopy (PCM), transmission electron microscopy (TEM), or another US EPA approved method for the analysis of air samples.
 - (c) An Asbestos Analytical Laboratory whose license encompasses bulk analysis must use the analytical methods set forth in Section 6(B)(2) polarized light microscopy (PLM) or transmission electron microscopy (TEM) in accordance with methodologies detailed in EPA's document, Test Method, Method for the Determination of Asbestos in Bulk Building Materials (EPA/600/R-93/116, July 1993) and any documents referenced therein. Other US EPA approved methods of bulk analysis may be used as well.
 - (d) An Asbestos Analytical Laboratory that performs air sample analysis must be an active participating laboratory rated proficient by the AIHA's PAT (American Industrial Hygiene Association's Proficiency Analytical Testing) program and must use the analytical methods set forth in Section 8(B)(2)(f).
 - (e) An Asbestos Analytical Laboratory that performs bulk sample analysis must be accredited by the National Voluntary Laboratory Accreditation Program (NVLAP) or be an active participating laboratory rated proficient by AIHA's bulk quality assurance program.

~~Note~~OTE: Samples collected as part of a school project must be analyzed by a NVLAP accredited lab in accordance with federal requirements.

(2) Personnel Requirements

- (a) An Asbestos Analytical Laboratory must have on staff at all times a certified Asbestos Air Analyst if the laboratory performs air analyses, or a certified Asbestos Bulk Analyst if the laboratory performs bulk analyses.
- (b) Each employee of an Asbestos Analytical Laboratory who engages in work as an analyst must hold a valid Asbestos Air or Bulk Analyst certificate, as applicable.
- (c) Each employee of an Asbestos Analytical Laboratory who performs TEM analysis (bulk and/or air) must be properly trained in TEM analytical procedures; documentation of their training must be maintained by the laboratory and provided to the department upon request.

(3) Application and Recordkeeping Requirements

- (a) Background information on the laboratory, including:

~~(d)~~(i) The names of the applicant's owner(s), or operator(s), principal(s), and officer(s);

~~(e)~~(ii) Location and mailing address;

~~(f)~~(iii) A list of all other entities performing asbestos abatement activities or asbestos associated activities in which individuals listed under section 4.E(3)(a)(I) of this rule are an owner or operator, principal or officer;

~~(g)~~(iv) A list of all names (or acronyms) by which the applicant's firm is known or under which it does business;

~~(h)~~(v) Any information requested by the Department for purposes of determining the proficiency and adequacy of the applicant's standard operating procedures;

- (b) The laboratory must submit documentation describing its QA/QC program for ensuring accuracy of analysis of air and bulk samples. This must include at a minimum, annual QA/QC training for all air and bulk analysts that includes:

(i) A review of applicable methods (NIOSH 9002, EPA/600/R-93/116, etc.);

(ii) A review of relevant current literature (AIHA, ACGIH, McCrone, etc.) and state-of-the-art technology;

(iii) A review of the lab's current QA/QC program, which should include at a minimum: the statistical calculation of intrinsic sample variability, intra-counter variability, and inter-and intra-laboratory variability, including the laboratory's current Relative Standard Deviation;

(iv) A review and hands-on session for microscope cleaning and calibration; and

- (v) Two hours of reading QA samples to determine the analyst's proficiency, including actual field samples, round-robin samples from other laboratories if applicable, and third party QA samples such as the PATs or AARs.
- (c) An applicant for Asbestos Analytical Laboratory must ~~submit sufficient information to demonstrate that the applicant meets the recordkeeping requirements set forth in these regulations and must make the following available for review within 24 hours of request by the Department:~~
 - (i) Sample chain of custody procedures, including but not limited to handling, storage, and disposal procedures;
 - (ii) A copy of the laboratories' analytical quality assurance program(s);
 - (iii) Equipment calibration and standardization procedures;
 - (iv) Results of the last four quarters of PAT or round robin tests, including the following: round number, date of participation in the round, and PAT results; including each individual analysts' individual results;
 - (v) Laboratory standard procedures for asbestos analysis;
 - (vi) An up to date asbestos analytical equipment inventory;
 - (vii) Documents related to laboratory personnel training;
 - (viii) The certificate of the laboratory owner, operator, or supervisor;
 - (ix) A copy of their NVLAP or AIHA accreditation as applicable; and
 - (x) A copy of their quality assurance program ensuring proficiency of all analysts.
- (d) Copies of state certificates and dates of employment for employees performing analyses; and
- (e) Copies of analyses performed, indicating sample identification number, analysis methods utilized, analytical results, and the name of the certified employee performing the analysis.

~~(4) In-house Asbestos Analytical Laboratory~~

- ~~(a) License Requirement. An In-house Asbestos Analytical Laboratory is required to be licensed by the Department pursuant to these rules. In-house laboratories are exempt from laboratory proficiency as long as each analyst is rated proficient by AIHA's Asbestos Analytical Registry or by an active participating laboratory that is rated proficient by AIHA or NVLAP and that has an independent business relationship with the in-house laboratory. Analysts must be annually rated proficient as part of their individual AIHA certification.~~
- ~~(b) Application and Recordkeeping Requirements. An applicant for In-house Asbestos Analytical Laboratory must meet all other application and recordkeeping requirements set forth in this rule for Asbestos Analytical Laboratory.~~

C. In-house Asbestos Abatement Unit

~~(1) License Requirements. A business entity or public entity that engages in an asbestos abatement activities solely within the confines of property owned or leased by that entity solely for its own benefit (not for the purpose of income, profit, or barter) and using its own employees (not independent contractors) must hold one of the following In-house Asbestos Abatement Unit licenses) must meet the licensing requirement below, as applicable:~~

~~(a) An In-house Asbestos Abatement Unit for the conduct of asbestos abatement activities including removal, repair, encapsulation, and enclosure.~~

~~(b) An In-house Asbestos Identification and Management Unit for the conduct of inspection, design, or monitoring activities.~~

~~(2) Personnel Requirements~~

~~(a) A certified Asbestos Abatement Project Supervisor must be present at the regulated area at all times when asbestos abatement activities are occurring.~~

~~(b) Employees of a licensed In-house Asbestos Abatement or In-house Asbestos Identification and Management Unit who engage in asbestos abatement or associated activities must be certified pursuant to these rules.~~

~~(3) Application Requirements.~~

~~An applicant for An In-house Asbestos Abatement Unit that engages in asbestos abatement activities, excluding asbestos associated activities, must meet the application requirements set forth in these rules for set forth in the Asbestos Abatement Contractor section of this rule.~~

~~An In-house Asbestos Abatement Unit that engages in the asbestos associated activities of inspection, design, monitoring must meet the application requirements set forth in the application requirements set forth in these rules for Asbestos Consultant section of this rule.~~

~~An In-house Asbestos Abatement Unit that engages in the asbestos associated activity of analysis for asbestos must meet the application requirements set forth in the Asbestos Analytical Laboratory section of this rule. In-house laboratories are exempt from laboratory proficiency as long as each analyst is rated proficient by AIHA's Asbestos Analytical Registry or by an active participating laboratory that is rated proficient by AIHA or NVLAP and that has an independent business relationship with the in-house laboratory. Analysts must be annually rated proficient as part of their individual AIHA certification.~~

~~(2) Personnel Requirements. Employees of a licensed In-house Asbestos Abatement Unit who engage in asbestos abatement or associated activities must be certified pursuant to these rules.~~

~~(4) Recordkeeping Requirements. An In-house Asbestos Abatement Unit must meet the recordkeeping requirements set forth in the Asbestos Abatement Contractor, Asbestos Consultant and Asbestos Analytical Laboratory recordkeeping sections of these rules, as applicable. An In-house Asbestos Identification and Management Unit must meet the recordkeeping requirements set forth in the Asbestos Consultant section of these rules.~~

F. Training Provider

- (1) License Requirement. A business entity or public entity that provides asbestos training within the geographic boundaries of the State of Maine must hold a valid Training Provider license.

A Training Provider whose principal place of business is located outside the State of Maine and who provides training only outside the geographic boundaries of the State of Maine is not subject to the licensing requirements set forth in this section.

Note~~OFE~~: Training courses also must be approved by the Department under the provisions of Section 10 of this rule.

(2) Personnel Requirements

- (a) Training Director. Each Training Provider shall employ a training director, certified as an Asbestos Abatement Design Consultant, who has overall responsibility for all aspects of training.
- (b) Instructors must have academic credentials and/or field experience as specified below in the area in which they provide training. Primary instructors must be approved by the Department. If, after receiving a Training Provider license, there is a change in teaching personnel, the Training Provider must notify in writing the Department of the names and credentials of the new instructors at least 30 days prior to the date of the next course offering.
- (i) Primary Instructors. The primary instructor(s) are the person(s) delivering the majority of the training material for the training course and the hands-on portion(s) of the course. Primary instructors must have successfully completed a Department-approved initial training course in the discipline being taught.
- (ii) Secondary Instructors. Secondary instructors are persons possessing academic credentials, training, and/or (field) experience in a particular area, who may regularly provide portion(s) of instruction at a course. Secondary instructors do not need to have attended initial asbestos training courses, but need to provide, prior to conducting training, the primary instructor with written documentation detailing his/her experience and copies of his/her training and/or academic credentials.

(3) Application Requirements. An applicant for Training Provider must submit:

- (a) Background information on the training provider, including:

~~(3)~~(i) The names of the owner(s), or operator(s), principal(s), and officer(s);

~~(4)~~(ii) Location and mailing address;

~~(5)~~(iii) A list of all other entities performing asbestos abatement activities or asbestos associated activities in which individuals listed in section 4.F(3)(a)(i) of this rule are an owner or operator, principal or officer;

- ~~(6)~~(iv) A list of all names (or acronyms) by which the applicant's firm is known or under which it does business; and
- ~~(7)~~(v) Any information requested by the Department for purposes of determining the proficiency and adequacy of the applicant's standard operating procedures.
- (b) A list of the qualifications and resumes of the instructors, primary and secondary, who will be teaching;
- (c) A detailed description of the number and quality of supplies and equipment, the availability of audio/visual teaching aid;
- ~~(13)~~d) A physical description of the primary training facility, including dimensions, that demonstrates that it is adequate for training and learning purposes as follows:
- i. ~~(a)~~ Lighting sufficient so that all areas of the training room are adequately illuminated for ease of reading and viewing visual presentations
 - ii. ~~(b)~~ Room size adequate to accommodate the expected/actual number of attendees with sufficient space to allow attendees ample space for seating, laying out training materials, and exam taking;
 - iii. ~~(c)~~ Tables sized to accommodate each student comfortably, without crowding. Chairs must be comfortable and of proper height to the table(s)
 - iv. ~~(d)~~ Air circulation must maintain a steady exchange of fresh air
 - v. ~~(e)~~ Background noise must be minimal and not distracting to the learning environment, such that exchanges between the trainer and attendees are audible at all times, and
 - vi. ~~(f)~~ At a minimum two means of egress from the building in which the training room is located; a large room may require two means of egress; and
 - vii. ~~(g)~~ A statement affirming that any facility and/or "hands-on facility", other than the primary training facility, used for training shall comply with the requirements of this subsection;
- (e) A copy of the course sign in/sign out log the training provider will use to track the times that students arrive and depart the course, including the times out and in for any lunch break. This log is to be filled in by the students when entering and exiting the classroom.
- ~~(d)~~f) An original student certificate issued upon successful completion of courses;
- ~~(e)~~g) An example of the format used to communicate to the Department the course results within 5 days of course completion, including participant names, social security numbers or date of birth, and exam scores;
- ~~(f)~~(h) A description of the method that the Training Provider will use to notify course dates, times and location to the Department. All courses must be announced in writing to the Department at least ten calendar days before the course;

(g) A statement that the Training Provider will issue student certificates within two weeks of the completion of the course; and

(h) The name and qualifications of the Training Director.

(4) Recordkeeping Requirements

(a) A Training Provider must maintain records of all requirements of section 11, course exam(s), and student answer sheets for a period of seven years and make them available to the Department within 24 hours of request, except as provided in section 4.F(4)(b) below.

(b) A Training Provider whose principal place of business is outside the State of Maine and who provides training to individuals seeking a certificate pursuant to this rule must make records and information available to the Department within 5 business days of receipt of a request for information.

(5) Standard of Conduct. The issuance of a fraudulent student certificate, or the violation of any provision of this rule or other applicable laws and regulations including the Model Accreditation Plan (MAP), constitutes grounds for the suspension or revocation of the Training Provider's license, the denial of the renewal of the license, and/or other enforcement action deemed appropriate by the Department.

(6) Reciprocity. Reciprocity, or the acceptance of an individual's training certificate indicating the successful completion of appropriate training, is allowed by this rule. Licensure of Training Providers is not reciprocal.

5. Certification Requirements for Asbestos Professionals

This section sets forth specific certification requirements for an individual engaging in an asbestos abatement activity. This section also sets forth the general standards of conduct, specific training, and other requirements for maintaining such certificates.

A. General Certification Requirements

(1) An individual who engages in an asbestos abatement activity regulated by this rule must hold a valid certification in the discipline appropriate to his/her responsibilities as set forth in this section.

Note: The Department is not able to process immediately applications that are hand-delivered.

(a) An individual who engages in asbestos abatement activities in more than one certification category must be certified in each such category.

(b) A certified individual also must meet all other state, federal, local accreditation, or certification requirements, as applicable.

(c) An individual must be 18 years of age to be eligible for certification.

(2) Certification by rule.

- (a) ~~Individuals who are employed by Department-limited licensed companies that remove asphaltic-based asbestos-containing roofing materials using mechanical roof-cutting operations are considered certified by the Department for purposes of these rules to perform this activity only, provided such individuals have successfully completed and documented training required by OSHA pursuant to 29 CFR 1926.1101 (effective August 10, 1994) and training documentation is maintained at the abatement work site.~~
- (b) ~~Individuals who are employed by Department licensed companies that remove exterior asbestos-containing cementitious products are considered certified by the Department for purposes of these rules to perform this activity only, provided such individuals have successfully completed and documented training required by OSHA pursuant to 29 CFR 1926.1101 (effective August 10, 1994), and training documentation is maintained at the abatement work site.~~
- (c) ~~Individuals who are employed by Department licensed companies that use large equipment to demolish buildings containing asbestos-containing roofing, flooring, gasketing, and packing materials are considered certified by the Department for purposes of these rules to perform this activity only, provided such individuals have successfully completed and documented training required by OSHA pursuant to 29 CFR 1926.1101 (effective August 10, 1994) and training documentation is maintained at the abatement work site.~~

NoteOTE: -Work practices as specified in Section 7 of this rule must be followed by individuals who are certified in accordance with these provisions.

B. Standards of Conduct.

Certified Asbestos Professionals must comply with all state and federal laws and regulations pertaining to asbestos abatement activities, including the conflict of interest provisions of section 2.G of this rule. Failure to comply with this rule may result in suspension or revocation of a certificate, denial of an application for renewal, and/or other enforcement action deemed appropriate by the Department. A certified individual must perform his or her activities in a manner that is:

- (1) ~~Substantially in~~ compliance with state-of-the art professional services generally recognized as acceptable by the asbestos consulting and abatement industries, asbestos professional associations, and government agencies; and
- (2) ~~Consistent with~~ compatible with current rules and practices taught by Department-approved Training Providers.

C. Application Requirements and Procedures

(1) General Application Requirements

- (a) An application for a ~~certificate~~ on (including renewal) must be made on forms approved by the Department, must include the applicant's social security number, and must be accompanied by documentation demonstrating that the substantive certification requirements of this section have been met, including an ~~attested~~ a copy of a training certificate ~~when requested by the Department.~~

- (b) An applicant must submit one passport-size color photo and a non-refundable application fee paid in full by a cashier's, certified, or company check or other Department-approved payment method, in the amount set forth in this section.
- (c) An applicant for certification must submit sufficient documentation to demonstrate that he/she has successfully completed the discipline-specific training and experience requirements.

Primary instructors must attend an initial training course from a licensed training provider that has an independent business relationship with the primary instructor, but may attend refresher courses taught by any licensed training provider. The primary instructor must notify [on the notification required by these regulations] the Department when he/she will attend their own refresher course. Primary instructors are prohibited from conducting refresher courses for themselves only.

NoteOTE: It is the responsibility of the individual planning to attend a training course to ensure that the training course is approved by or acceptable to the Department. A training course that is not approved by the Department will not meet the standards for certification of individuals pursuant to this section unless reciprocity is granted.

- (d) An applicant must attest knowledge of and compliance with their current employer's standard operating procedures.
- (e) The Department will either deny an application or ask for further information.
- (f) If the Department requests further information and does not receive it in full within ~~60~~30 calendar days, the application will be denied.
- (g) After reviewing an application and determining that the applicant has met the minimum requirements of training and experience (where applicable) as set forth in this section, the Department will approve the application and issue a state certificate.
- (h) A state-issued asbestos certification card evidencing that the individual is currently certified to perform asbestos abatement activities ~~certificate~~ is the property of the individual to whom it is issued.
- (i) Except as provided in this section below, an expired certificate prohibits the individual from engaging in the applicable asbestos abatement activity until a current certificate is obtained.

(2) Annual Renewal and Reapplication Procedures

- (a) A certificate shall expire one year from the last day of the month from the date of issuance, or on the last day of the month that the training certificate expires, whichever is sooner, and may be renewed on an annual basis.
- (b) If the Department receives a request at least five (5) working days prior to a certification expiration date, the Department may grant an extension of a certificate for up to thirty (30) days when a Maine refresher course has not been recently-available within the last

~~thirty (30) days and the applicant has signed up for the next available applicable Maine refresher course during the extension period.~~

NoteOTE: Extensions to certifications are not valid for work on projects in schools and public and commercial buildings.

- (c) If a complete renewal application is received by the Department at least five (5) working days prior to expiration of their state certificate, the certificate will not expire until the Department takes final action on the application.
 - (d) Individuals must take an annual refresher course or participate in a laboratory quality assurance program as appropriate to their respective certification category. Individuals who fail to meet this requirement within one year of the expiration date of their training certificate must take initial training again.
 - (e) If an applicant has been denied under this section, the applicant must adequately address in writing each denial reason.
- (3) Denial of Applications. The Department may deny an applicant for:
- (a) Failure to submit documentation demonstrating his or her ability to comply fully with applicable requirements, procedures, and standards set forth in this rule;
 - (b) A history of incompetence or negligence, as determined by the Department based on previous compliance inspection(s), review of operating record(s), or other documents;
 - (c) Submission of false information on an application;
 - (d) Submission of an incomplete application;
 - (e) Failure to submit the required fee; or
 - (f) Past violations(s) of State or federal laws or regulations pertaining to asbestos abatement activities.
- (4) Reciprocity. An individual who is certified, accredited, or permitted by another governmental agency may be granted reciprocity from the Department for a certificate in the State of Maine. The applicant must submit a non-refundable application fee, as set forth in this section, along with appropriate documentation. The certificate will be granted only if the Department determines the certification requirements of the other governmental agency to be at least as stringent as the applicable requirements of this rule, including approval of the training course by an EPA-approved state program or equivalent pursuant to Appendix C, the Interim Final Rule-59 FR 5236-5260 (effective April 4, 1994), to Subpart E of the Asbestos-Containing Materials in Schools rule, 40 CFR, Part 763 (effective December 14, 1987).
- (5) Fees. Applications for initial and renewal certification must be accompanied by a non-refundable application fee paid in full by a cashier's, certified, or company check or other Department-accepted method, made payable to the Maine Environmental Protection Fund, as follows:
- (a) Application fees:

- Asbestos Abatement Worker: \$250.00
- Asbestos Abatement Project Supervisor: \$5100.00
- Asbestos Air Monitor: \$5100.00
- Asbestos Inspector: \$5100.00
- Asbestos Abatement Design Consultant: \$5100.00 (includes limited certification)
- Asbestos Air Analyst: \$1050.00
- Asbestos Bulk Analyst: \$5100.00
- Asbestos Management Planner: \$5100.00

(b) An individual applying for a certificate in more than one certification category during the same calendar year must pay the fee for the highest category first and then pay \$250 for each additional category.

(c) Reissuance of a certificate or photo ID card: \$450.00

Note: If there are not sufficient funds to cover the check or credit card transaction an insufficient funds fee will be assessed by the Department in accordance with State of Maine laws and policies. Until that insufficiency is resolved (by money order or bank check), the Department will not accept any additional checks or credit card transactions from the party including checks for project notifications.

D. Required Certification

- (1) An individual who engages in asbestos abatement activities, excluding associated activities ~~for an employer, must hold a either a valid Maine Asbestos Abatement Worker or certificate unless certified in Maine as an~~ -Asbestos Abatement Project Supervisor certificate.
- (2) An individual who directly supervises those engaged in any asbestos abatement activity, excluding associated activities, must hold a valid Asbestos Abatement Project Supervisor certificate.
- (3) An individual who documents and/or oversees an asbestos abatement activity for an owner or operator, conducts visual evaluations of the work area, collects air samples, or conducts project monitoring must hold a valid Asbestos Air Monitor certificate.
- (4) An individual who engages in inspections or surveys facilities to identify and/or assess the condition of ACM, or an individual who collects bulk samples for analysis, must hold a valid Asbestos Inspector certificate.
- (5) An individual who engages in any one or more of the following asbestos associated activities must hold a valid Asbestos Abatement Design Consultant certificate:
 - (a) ~~Advises building owners, contractors and project supervisors on the health impacts of Designs asbestos abatement activities~~abatement activities or projects;
 - ~~(b) Writes abatement specifications;~~
 - ~~(c) Determines how asbestos abatement activities should be conducted;~~

- ~~(db)~~ Develops project designs, or writes work orders or specifications for asbestos abatement or facility renovation, repair, or replacement where the work will impact or has the potential to impact or disturb ACM regulated by this rule; or
- ~~(eb)~~ Supervises the implementation of project designs; or
- ~~(de)~~ Designs and supervises training courses as a Training Director.

- (6) An individual who performs analyses of air samples for asbestos or total fiber count must hold a valid Asbestos Air Analyst certificate.
- (7) An individual who performs analyses of bulk samples for the quantification or qualification of asbestos must hold a valid Asbestos Bulk Analyst certificate.
- (8) An individual who uses data gathered by an Asbestos Inspector to assess asbestos hazards, determine appropriate response actions, or develop asbestos response action implementation or asbestos operation and maintenance programs in schools must hold a valid Asbestos Management Planner certificate.

E. Training, Education and Experience Requirements

- (1) The minimum training, education, and experience requirements for initial certification in each discipline are as follows:
 - (a) Asbestos Abatement Worker - successful completion of a Department-approved 4-day ("32 hour") asbestos abatement worker training course and exam.
 - (b) Asbestos Abatement Project Supervisor - successful completion of a Department-approved 5-day ("40 hour") asbestos abatement project supervisor training course and exam.
 - (c) Asbestos Air Monitor - successful completion of a Department-approved 5-day ("40 hour") asbestos air monitor training course and exam; or successful completion of Department-approved project supervisor and 16-hour (minimum) air monitoring courses and exams; or, for out-of-state applicants, a combination of training and experience equivalent to the training required in this section.
 - (d) Asbestos Inspector - successful completion of a Department-approved 3-day ("24 hour") inspector training course and exam.
 - (e) Asbestos Abatement Design Consultant
 - (i) Successful completion of a Department-approved 3-day ("24 hour") project design training course and exam;
 - (ii) Possession of at least a bachelor's degree, or possession of any valid asbestos professional certificate, excluding Asbestos Abatement Worker, for 3 years, or some other combination of training, education, and experience deemed appropriate by the Department.
 - (f) Asbestos Abatement Design Consultant – Limited Certification for Training Directors

- (i) Successful completion of a Department-approved 3-day ("24 hour") project design training course and exam.
 - (ii) A post-secondary degree in adult education or successful completion of a "Train the Trainer" course acceptable to the Department consisting of the following course topics at a minimum:
 - Adult learning principles
 - Training theory
 - Various training skills and techniques
 - Delivery techniques
 - Organizing and preparing presentations
 - Classroom management
 - Small and large group activities
 - Use of audio visuals
 - (iii) Possession of at least a bachelor's degree, or possession of any valid asbestos professional certificate, excluding Asbestos Abatement Worker, for 3 years, or some other combination of training, education, and experience deemed appropriate by the Department.
- (g) Asbestos Air Analyst - successful completion of a Department-approved 5-day ("40 hour") Asbestos Air Analyst training course and exam equivalent to the former NIOSH Course #582, "Sampling and Evaluation of Airborne Asbestos".
- (h) Asbestos Bulk Analyst - successful completion of a Department-approved training course and exam in the techniques and procedures for identification and quantification of asbestos in bulk samples (e.g., McCrone Institute Asbestos Bulk Analysis course or its equivalent).
- (i) Asbestos Management Planner
- (i) Successful completion of a Department-approved 3-day ("24 hour") inspector training course and exam;
 - (ii) Successful completion of a Department-approved 2-day ("16 hour") management planner training course and exam.
- (2) The minimum on-going training and other requirements for renewal certification in each discipline are as follows:
- (a) Asbestos Abatement Worker - successful completion of a Department approved one-day ("8 hour") worker annual refresher course and exam.
 - (b) Asbestos Abatement Project Supervisor - successful completion of a Department approved one-day ("8 hour") project supervisor annual refresher course and exam.
 - (c) Asbestos Air Monitor - successful completion of a Department approved 1/2-day ("4 hour") asbestos air monitor refresher course and exam.

(d) Asbestos Inspector - successful completion of a Department approved 1/2-day ("4 hour") asbestos inspector refresher course and exam.

(e) Asbestos Abatement Design Consultant - successful completion of a Department approved one-day ("8 hour") project design refresher course and exam.

~~(f) Asbestos Abatement Design Consultant - Limited Certification for Training Directors - Individuals certified as Conditional Asbestos Abatement Design Consultants as of the effective date of this rule must meet the initial certification requirements detailed in these rules within 12 months of the effective date of this rule.~~

~~(g)~~(f) Asbestos Air Analyst

~~(7)~~(i) Documentation of participation in a Maine-licensed laboratory's annual analyst QA/QC training, and

(ii) A statement from a licensed Asbestos Analytical Laboratory affirming that the applicant is proficient in air analysis through participation in the laboratory's administration of the AIHA's PAT program, including results of the last four rounds of the applicant's testing, or proof that the applicant is listed in the AIHA Asbestos Analysis Registry.

~~(h)~~(g) Asbestos Bulk Analyst

(i) Documentation of participation in a Maine-licensed laboratory's annual analyst QA/QC training, and

(ii) A statement from a licensed Asbestos Analytical Laboratory affirming that the applicant is proficient in bulk analysis through participation in the laboratory's administration of the NVLAP or AIHA bulk quality assurance program, including results of the last 4 rounds of the applicant's testing.

(i) Asbestos Management Planner - successful completion of a Department-approved 1/2-day ("4 hour") asbestos manager planner refresher course and exam.

F. Responsibilities

(1) An Asbestos Abatement Worker must possess a valid Maine certificate at the work site.

(2) An Asbestos Abatement Project Supervisor must possess a valid Maine certificate at the work site. An Asbestos Abatement Project Supervisor who is the lead supervisor on a project is responsible for directing correction of problems when encountered and terminating activity if needed to comply with all applicable work practice requirements of these rules.

(3) An Asbestos Air Monitor:

(a) Must conduct monitoring activities in accordance with ~~generally~~ recognized monitoring practices. This includes, but is not limited to, (1) clearance sampling techniques, including those required by TEM; (2) location and frequency of area monitoring including background sampling; (3) pump calibration methods; (4) settled dust sampling

techniques; (5) visual evaluation techniques; and (6) project monitoring including preparation of an air monitor plan as part of a project design;

(b) May interpret project specifications or abatement plans and monitor and evaluate asbestos abatement activities for compliance with applicable laws and regulations; and

(c) Must possess a valid Maine certificate on-site at an asbestos abatement activity.

(4) An Asbestos Inspector:

(a) May review building records and perform inspections of facilities to identify, document, or inventory materials suspected of containing asbestos. An Asbestos Inspector shall collect bulk samples for asbestos analysis according to generally recognized procedures established by the industry, the Department, current US EPA guidance documents, and other applicable state or federal rules or regulations;

(b) Must, when performing assessments or evaluations of ACM, utilize assessment methodologies outlined in AHERA or an equivalent assessment system to evaluate the condition, accessibility, and intactness of ACM; and

(c) Must possess a valid Maine certificate on-site at an asbestos abatement or associated activity.

(5) An Asbestos Abatement Design Consultant:

(a) Must apply knowledge of building construction, design, and use to develop operations and maintenance plans, abatement designs including air monitoring plans, specifications, bidding documents, architectural drawings, and schematic representations of material locations, in a manner consistent with these regulations; and

(b) Must possess a valid Maine certificate on-site at an asbestos abatement activity or training course location.

(6) An Asbestos Air Analyst must possess a valid Maine certificate at any facility or location where analysis is being performed.

(7) An Asbestos Bulk Analyst must possess a valid Maine certificate at any facility or location where analysis is being performed.

(8) An Asbestos Management Planner must possess a valid Maine certificate at his or her principal place of business.

6. Pre-Abatement Requirements

A. Renovation and Demolition Inspections. Prior to conducting a renovation or demolition activity that impacts any building material likely to contain asbestos (such as those used in roofing, flooring, siding, ceiling, and wall systems) or any component likely to contain asbestos (such as heating, ventilation, air conditioning, and plumbing systems), the owner or operator must have an inspection conducted for the presence of asbestos-containing materials. In lieu of inspection, the owner or operator may presume that building materials and components contain asbestos that requires that these materials be abated in accordance with these rules.

A DEP-certified Asbestos Inspector must perform the inspection. The inspection must identify all asbestos-containing materials that could be impacted during the renovation or demolition activity, must be completed prior to submission of notification to the Department, must be in writing, and must be on-site and made immediately available to the Department upon request.

Residential dwellings constructed before 1981 that consist of two (2) to four (4) units must be evaluated for building materials and components that are likely to contain asbestos. This evaluation may be performed by a DEP-certified Asbestos Inspector or by a person familiar with asbestos-containing building materials. If building materials and/or components likely to contain asbestos are found, these must be removed in accordance with these regulations prior to demolition except as allowed in section 7.B of this rule or must be tested by a DEP-certified Asbestos Inspector to demonstrate that they are not ACM.

Single family residences, and residences constructed after 1980 that consist of two (2) to four (4) units, are exempt from the inspection provisions of this section.

Specific building materials that do not require inspection, sampling, and analysis for asbestos include: wood, fiberglass, glass, plastic, metal, laminates, foam rubber and gypsum board when joint compound was used only as a filler and not as a layered component, and intact exterior caulks and glazings. Also, building materials do not need to be inspected when written documents exist confirming that no asbestos was used in the materials that will be impacted, or that the materials were previously inspected by a DEP-certified Asbestos Inspector and affirmatively determined through sampling and analysis to not be ACM.

Note: To maintain compliance with Maine law, if more than 3 square feet or 3 linear feet of ACM is present, this ACM must be removed prior to the demolition, except that intact packing, gaskets, roofing, and flooring may be left in place when the demolition is performed by large equipment in accordance with these rules. Homeowners are encouraged to conduct a walk through of their single family homes to identify suspect asbestos-containing materials, such as thermal system insulation, ceiling tile, exterior cementitious siding, rigid panels, and resilient flooring covering, and hire an asbestos-consultant or asbestos abatement contractor if suspect materials are observed. The Department can provide, upon request, more information regarding common asbestos-containing materials in buildings.

B. Inspection Requirements. Inspection includes collecting bulk samples for analysis and/or conducting assessments of asbestos-containing materials. Inspections must be conducted as follows:

(1) Bulk samples must be collected by a Department-certified Inspector as prescribed below, in a random manner such that they are representative of each homogenous area. Bulk samples shall be collected and analyzed for all asbestos abatement activities unless an approved disclosure is received by the owner or owner's agent from the operator prior to the start of the project.

(a) From Surfacing Material

(i) ~~At least~~ 3 bulk samples from each homogenous area and/or material that is 1000 square feet or less;

(ii) ~~At least~~ 5 bulk samples from each homogenous area that is greater than 1000 square feet but less than or equal to 5000 square feet; or

(iii) ~~At least 7~~ bulk samples from each homogenous area that is greater than 5000 square feet.

(b) From Thermal System Insulation

(i) ~~At least 3~~ bulk samples from each homogenous area;

(ii) ~~At least 1~~ bulk sample from each homogenous area of patched thermal system insulation if the patched section is less than 6 linear or square feet; and

(iii) Samples sufficient to determine whether the material is ACM from each insulated mechanical system where cement is utilized on tees, elbows, or valves.

(c) From Miscellaneous ACM

(i) ~~At least 3~~ ~~samples from each miscellaneous material as set forth in sections 6.B(1)(a) or (b) of this rule, as applicable; or; and~~

(ii) ~~At least one~~ sample if the amount of miscellaneous material is less than 6 square or linear feet.

(2) Analysis. Bulk samples collected pursuant to this rule must be analyzed by a Department-licensed Asbestos Analytical Laboratory as described below.

(a) Bulk samples shall be analyzed until a positive result is obtained or all samples have been analyzed. Reanalysis is not required if the sample result is less than 1%.

The building owner may direct the asbestos analytical laboratory to have their bulk samples with an asbestos content of less than 10% point counted in accordance with the specified point counting method for that sample in order to evidence that the bulk sample contains less than 1% asbestos.

(b) Wherever there is a suspect asbestos-containing material and a mastic/adhesive affixed to that material, the mastic/adhesive shall be analyzed and reported separate from the suspect asbestos-containing material.

(c) Analysis of surfacing materials, thermal system insulation and cementitious materials.

(i) -Bulk samples of surfacing materials and thermal system insulation and cementitious materials shall be analyzed using the PLM -EPA 600/R-93/116 visual estimation method (1993).

(ii) Point counting surfacing materials and thermal system insulation samples

With informed documented consent of the building owner, the asbestos consultant may direct the asbestos analytical laboratory to have bulk samples with an asbestos content of less than 10% point counted in accordance with the method in order to further characterize asbestos percentage. Point counting methods are as follows:

PLM EPA/600/R-93/116 (200 Point Count);

PLM EPA/600/R-93/116 (400 Point Count); and

PLM EPA/600/R-93/116 (1000 Point Count)

Alternative analytical methods for surfacing materials and thermal system insulation and cementitious materials.

With informed documented consent of the building owner, the asbestos consultant may direct the asbestos analytical laboratory to have bulk samples of asbestos-containing surfacing materials and thermal system insulation analyzed using the following methods where the asbestos analytical laboratory has determined is it not feasible or appropriate to analyze the bulk sample(s) using the standard visual estimation PLM –EPA 600/R-93/116 method: The alternative methods include:

EPA 600/R-93/116 section 2.5.5.2 (TEM % by Mass)

(d) Analysis of asbestos-containing non friable organically bound materials (NOB)

Bulk samples of non-friable organically bound materials (NOB) including but not limited to floor tiles, asphalt shingles, caulking, glazing, mastics, coatings, sealants, adhesives and glues shall be analyzed using PLM NOB –EPA 600/R-93/116 with gravimetric preparation method.

(ii) Point Counting NOB samples

With informed documented consent of the building owner, the asbestos consultant may direct the asbestos analytical laboratory further characterize the asbestos percentage of NOB samples with an asbestos content of less than 10%. The analyst shall point count the sample residue after the gravimetric preparation is completed and/or in accordance with the analytical method

(iii) Alternative analytical methods for non friable organically bound materials (NOB) samples

With informed documented consent of the building owner, the asbestos consultant may direct the asbestos analytical laboratory to have bulk samples of NOB's analyzed using any of the following methods where the asbestos analytical laboratory has determined is it not feasible or appropriate to analyze the sample(s) using the standard PLM –EPA 600/R-93/116 with gravimetric preparation: The alternative methods include:

TEM EPA NOB EPA/600/R-93/116b section 2.5, and
TEM Chatfield method

(e) In instances where there is a positive and a negative sample result for the same sampled bulk material(s) from different sampling events, the material(s) is considered to be asbestos-containing. The owner may elect to have the material(s) re-sampled. Representatives from the previous sampling events are to be present at the re-sampling event. Alternatively, the building owner may elect to have a third party re-sample the materials. The building owner must provide the third party with the inspection reports and analytical results from the earlier sampling events before re-sampling. In either instance, split samples shall be sent to two separate laboratories for re-analysis using an agreed upon analytical method; any sample/material testing positive by either laboratory is positive for asbestos.

(3) Other Analytical Methods for Non-Regulated Materials/ and Media

Sampling and analysis of non-regulated materials/ and media including but not limited to, water, dust, rock, soil, minerals and asbestos-contaminated products such as vermiculite, may be appropriate to determine the presence of asbestos fibers in the material/ or medium and to assist in determining appropriate work practices and the scope of any clean-up activities of these non-regulated materials/ and media. Current state-of-the-art analytical methods include:

- (a) Analysis of water samples for asbestos:
EPA method 100.2 analytical method.
- (b) Analysis of dust samples for asbestos:
EPA 600/R-93/116;
ASTM D-5755;
ASTM D-6480 ;
- (c) Analysis of rock, soil and mineral such as vermiculite samples for asbestos
CARB 435 Level A-C (preferred method)
EPA 600/R-93/116
EPA-600/M4-82-020 (40 CFR Appendix A to subpart E)
Region I SOP:EIA-INGASED3.SOP (3/9/05)
EPA 600/R-04/044 (PLM and TEM)

Note: The remediation of asbestos-containing bulk materials co-mingled in soils in quantities greater than 3 (three) square feet is an activity that is regulated under this rule.

~~shall be analyzed using polarized light microscopy (PLM) or transmission electron microscopy (TEM) in accordance with methodologies detailed in EPA's document, Test Method, Method for the Determination of Asbestos in Bulk Building Materials (EPA/600/R-93/116, July 1993) and any documents referenced therein; and~~

- ~~—(c) Bulk samples of asbestos-containing surfacing materials and thermal system insulation and cementitious materials may only be analyzed using the PLM EPA 600/R-93/with an asbestos content less than 10% as determined by PLM must be reanalyzed by TEM, point counting, or other US EPA approved method.~~
- ~~—Reanalysis is not required if the applicable PLM result is non-detect.~~

C. Design. Asbestos abatement activities, exclusive of asbestos associated activities, are subject to the project design requirements specified below. The Asbestos Abatement Design Consultant responsible for the design of record (latest version) must ensure that the design is consistent with the requirements of this rule. The design must be completed prior to the start of the activity. Any change to the original project design must be approved in writing by an Asbestos Abatement Design Consultant, ~~and received by the original Asbestos Abatement Design Consultant before the change is implemented.~~ The project design must contain the following at a minimum:

- (1) Project drawings, including ACM location and quantity, location of regulated area, ventilation system, decontamination facility, and, where applicable, the waste load-out unit;

(2) An air monitoring plan developed in accordance with the requirements of section 8, and including the number of air clearance samples included in the project contract;

(3) A description of work practice methods to be used;

(4) A description of personnel decontamination methods and sequences;

☐ (5) Documentation of any non-standard work practices practice including documentation of the notification to the asbestos design consultant who prepared the original project design for the project of ~~the any~~ non-standard work practice requests submitted to the Department, where applicable;

☐ (6) If bulk sampling and/or project monitoring will not be performed, copies of the appropriate disclosures, as developed by the Department;

☐ (7) The name, certification number, and signature of the Asbestos Abatement Design Consultant responsible for the design;

☐ (8) The function(s) and respective areas of responsibility for certified personnel and licensed companies involved in the project; and

☐ (9) A description and scope of work for pre-cleaning any existing asbestos-containing debris within the boundaries of the regulated area, as defined by the design.

D. Disclosures.

(1) Prior to agreeing to perform an asbestos associated activity, an asbestos consultant firm must provide to the facility owner or agent a disclosure form approved by the Department listing all asbestos abatement contractor firms with which the asbestos consultant does not have an independent business relationship.

(2) Prior to the start of the asbestos abatement activity, if any materials are presumed to contain asbestos the asbestos abatement contractor or the asbestos abatement design consultant (as determined by the design requirements) must provide the building owner or building owner's agent with a bulk sampling disclosure listing which materials identified for abatement have not been sampled and the cost of sampling those materials. Also prior to the start of the asbestos abatement activity, the asbestos abatement contractor or the asbestos abatement design consultant (as determined by the design requirements) must provide the building owner or building owner's agent with a project monitoring disclosure form discussing the advantages of project monitoring, including project management and/or area sampling, by an asbestos consultant firm with an independent business relationship with the entity performing the abatement. The bulk sampling disclosure and the project monitoring disclosure forms must be approved by the Department before they may be provided to the building owner or building owner's agent. Operators must document that the building owner or owner's agent received the disclosure(s) by obtaining the building owner's or owner's agent's signature on a statement acknowledging receipt.

Disclosures may be submitted to the owner or owner's agent on an annual basis for facilities with on-going asbestos abatement activities.

NoteOTE: -The Department will provide asbestos abatement contractors and asbestos abatement design consultants with pre-approved language for the bulk sampling disclosure and the project monitoring disclosure.

- 7. Asbestos Abatement Work Practice Requirements.** This section establishes minimum work practice requirements for asbestos abatement activities. All asbestos abatement activities are subject to these work practice requirements. All projects must be performed in accordance with an applicable project design, as set forth in these rules.

A. General Work Practice Requirements. Asbestos abatement activities, exclusive of asbestos associated activities, must comply with the following work practice requirements:

- (1) A certified Asbestos Abatement Project Supervisor must be designated as the lead supervisor for the project and must be present at the work site at all times personnel are within the regulated area.
- (2) Establishing the Regulated Area. Prior to starting an asbestos abatement activity, the Asbestos Abatement Contractor must establish the regulated area. For activities where containment is not required, the regulated area shall be demarcated with barrier tape marked "ASBESTOS HAZARD" (or equivalent wording) and OSHA warning signs, and located such that it protects persons from exposure to asbestos and minimizes the number of persons in the area. In facilities where plastic barrier tape may cause a safety hazard, red cloth tape may be used.

NoteOTE: If establishing an exclusion zone, the exclusion zone should be demarcated with barrier tape that is different from the tape used to demarcate the regulated area.

The regulated area must include the following:

- (a) Except as allowed under the provisions of sections 7.B and 7.D of this rule, a work area containment meeting the following requirements:
 - (i) A polyethylene-enclosed structure formed by partitions or framing or by covering walls and ceilings with a minimum of 2 layers of 4-mil polyethylene sheeting or 1 layer of 6-mil polyethylene sheeting, and by covering the floor with a minimum of 2 layers of (six) 6-mil polyethylene sheeting. The surface to be abated does not need to be covered with polyethylene sheeting. For suspended ceiling tile system removals, containment above the ceiling also is required for interior walls that do not extend from floor to ceiling; that is, a gap exists above the ceiling system where asbestos fibers could migrate to areas not being abated. Perimeter areas along interior walls therefore must be accessed and/or removed first and 2 layers of 4-mil polyethylene sheeting or 1 layer of 6-mil polyethylene sheeting established as containment prior to removing interior portions of the ceiling system. Exterior walls must have critical barriers established in section 7.A(2)(d) of this rule;
 - (ii) Fiber-tight seams in the polyethylene coverings; and
 - (iii) An access into the polyethylene-enclosed containment provided through the decontamination unit.

NoteOTE: When containment is not required, all other work practice requirements, including all other requirements for the regulated area, still apply.

- (b) A decontamination facility consisting of aluminum, tin, fiberglass, preformed plastic, or other impervious surface, or two layers of (six) 6-mil polyethylene sheeting. Decontamination facilities must have (six) 6-mil polyethylene sheeting flaps or air-locks between each chamber. Remote decontamination facilities are exempt from the ventilation system required below. Where construction of a decontamination unit meeting minimum size requirements is not possible due to room size and configuration, HVAC system component locations, life safety code requirements or restriction of safe egress for residents, a smaller than standard decontamination facility may be constructed.
- (c) A ventilation system meeting the following requirements:
 - (i) The exchange of at least 4 volumes of air per hour at a volume sufficient to establish and maintain a pressure differential within the ambient environment of negative 0.02 inches of water column;
 - (ii) The ventilation units must be operated in accordance with US EPA recommendations set forth in Appendix J of US EPA Guidance Document EPA 560/5-85-024 (effective June, 1985) or in Appendix F to 29 CFR Part 1926.1101 (effective August 10, 1994);
 - (iii) The make-up air entering the containment must pass through the decontamination system whenever possible, or through waste load-out and/or make-up air intakes specified by the project design;
 - (iv) The exhaust air must be HEPA filtered before being discharged outside of the work area and must be discharged ~~either outside the facility to a location that is not near any intake for building ventilation, or,~~ The HEPA-filtered exhaust air may be discharged inside the facility if access to the outside is not feasible because the distance from the regulated area to the outside of the building is too great (such as in large industrial building or warehouses), or when health and safety concerns, such as blocking egress from an area with limited access to an area of the facility with no exposed or damaged ACM. If the exhaust air is discharged inside the facility, the contractor shall demonstrate that the unit(s) is operating effectively by evidencing that air samples collected from the exhaust stream are less than 0.01 f/cc or that the audio alarm filter and/or filter change lamps and the unit(s) pressure differential filter monitoring meter is operational.

Ventilation units may be shut down overnight when the only source of electrical power for the project is a portable generator that must be removed at night. The entry into the work area must be sealed (fiber-tight) whenever ventilation units are shut down.
- (v) The exhaust air tubes or ducts associated with the work area ventilation system must be fiber-tight and must be securely attached to the HEPA unit exhaust port.
- (d) Critical barriers. Critical barriers are required for all projects.

- (i) Prior to suspended ceiling tile removals, the perimeter area above the ceiling must be accessed first, under negative pressure with properly protected employees to allow the sealing, as critical barriers, of penetrations and openings along the perimeter.

NoteOTE: Removal of perimeter ceiling tiles must be conducted as an abatement activity subject to all applicable work practice requirements.

- (e) A waste load out, if applicable.

(3) Exclusion of Persons from the Regulated Area and Posting Signs.

- (a) Individuals not directly involved in the asbestos abatement activity must be excluded from the regulated area.

- (b) Warning signs, meeting the requirements set forth in 29 CFR 1926.1101 (effective August 10, 1994), shall be posted at all approaches to the regulated area, and at the decontamination and waste load out unit's outermost boundaries.

(4) Regulated Area Control. An Asbestos Abatement Project Supervisor must be present at the work site at all times during active abatement activities. The Supervisor must have the authority to initiate and implement corrective action should problems or deficiencies arise at the asbestos worksite.

(5) Physical Barriers. Physical barriers must be established if indicated in the project design.

- (6) Personal Protective Equipment. An individual involved in an asbestos abatement activity or an individual who enters the regulated area, excluding the clean room, must be provided with and wear appropriate respiratory protection and personal protective clothing. Minimum respiratory protection shall be 1/2-faced negative pressure respirator equipped with HEPA filters. Minimum protective clothing shall be disposable full body suits, including head and foot coverings. Wearing a bathing suit underneath disposable full body suits is allowed.

NoteOTE: OSHA also regulates asbestos activities involving respirators and personal protective equipment. OSHA regulations may require a higher degree of respiratory protection and/or protective clothing.

(7) Isolation of HVAC Systems. All intake openings, exhaust openings, and any holes in the building HVAC system and its components located within the regulated area must be fiber-tight and covered with two-layers of (six) 6-mil fiber-tight sheeting, and all seams in the system must be taped to be fiber tight.

(8) Covering of Movable and Immovable Objects.

- (a) Movable objects within the regulated area must be removed or, if not feasible, treated as an immovable object below.
- (b) Immovable or fixed objects within the regulated area must be wrapped with two layers of six (6) mil thick (minimum) polyethylene sheeting that is fiber-tight prior to the commencement of abatement activity.

(9) Air and Project Monitoring. All asbestos abatement activities are subject to the following air and project monitoring requirements:

- ____ (a) An air monitoring program that is developed by an Asbestos Air Monitor must be in place and be consistent with these rules; and
- (b) A project monitoring program, if applicable, that is developed by an Asbestos Air Monitor must be in place and be consistent with these rules.

NoteOTE: An air monitoring program consists of air clearance sampling at a minimum, and may include background and area samples. See "Monitoring". OSHA requires personal sampling for most activities.

(10) Wetting of ACM. Prior to removal of ACM, including removal of components covered with thermal system insulation, ~~except as provided in this section~~, all ACM must be adequately wetted with water, except as provided below. Throughout the removal, storage, transport, and disposal processes, ACM must be kept adequately wet.

(a) Wetting ACM not required under the following conditions:

- (i) When the temperature inside the regulated area is below 32°F and heating the area is neither feasible nor practical (e.g., abandoned warehouse or roof);
- (ii) When electrical conditions exist that are noted in the design plan and demarcated in the specific work area, and that would render that specified area hazardous to shock and/or electrocution hazards; or
- (iii) When operational high-pressure steam lines are being abated or repaired.
- (iii) Wetting metal jacketed piping during wrap and cut operations. ACM exposed during glove-bagging associated with the wrap and cut process must be wetted in accordance with standard glove-bag procedures.

Note: When not wetting ACM during removal is allowed, the ACM must still be adequately wet during storage, transport, and disposal.

(11) Containerization of Waste at Elevations Exceeding 10 Feet. Excluding removal of acoustical, sprayed-on, troweled-on, or fireproofing ceiling materials, ACM must be containerized at the height of removal if the elevation of the material is 10 feet or greater from the ground or floor. Roofing waste may be lowered to ground level in a closed cluster in a pan scale or similar equipment prior to packaging.

(12) Containerization of Asbestos Waste. Prior to removal from the regulated area, asbestos waste must be containerized in fiber-tight leak-proof packaging and properly labeled, in accordance with OSHA 29 CFR Part 1926.1101 (effective August 10, 1994). ~~Fiber tight packaging must be maintained throughout the storage, transport, and landfilling processes.~~

- (a) Friable Friable-asbestos waste and asbestos-containing cementitious materials removed from inside of occupied facilities. Friable aFriable-asbestos waste that does not contain

components with sharp edges must be adequately wetted and then containerized in two (2) polyethylene bags with a six (6) mil minimum thickness for each bag. Bags shall be then individually sealed in a fiber-tight manner by first removing air from the bag, and then twirling the open end of the bag sufficiently enough to permit the twirled end to be folded over and wrapped securely with duct tape. Fiber-tight drums may be used in lieu of bags to package waste. Liners inside dumpsters and roll-offs can not be used to meet this containerization requirement. If, however, the configuration or shape of the asbestos waste is such that the containerization of the asbestos waste in bags is not feasible, then it shall be adequately wetted and thoroughly wrapped in a minimum of two (2) layers of six (6) mil polyethylene sheeting with all joints, seams and overlaps sealed in a fiber-tight manner. ~~Fiber tight drums may be used in lieu of bags to package friable waste. Unless intact and removed by a non-aggressive method, asbestos-containing flooring waste and a~~ Asbestos-containing cementitious materials removed from inside of occupied facilities must be containerized in accordance with this section are considered friable and must be double bagged. Bags shall be then individually sealed in a fiber-tight manner by first removing air from the bag, and then twirling the open end of the bag sufficiently enough to permit the twirled end to be folded over and wrapped securely with duct tape. All friable asbestos shall be disposed of in a landfill licensed to accept friable asbestos waste.

- (b) ~~Non-friable~~ Non-friable asbestos waste. Non-friable waste may be packaged as set forth in Section 7.A(12)(a) friable or must be adequately wetted and thoroughly wrapped in a minimum of two (2) layers of 6 mil or one (1) layer of 12 mil polyethylene sheeting with all joints, seams, and overlaps sealed in a fiber tight manner. Containerization in disposable leak proof fiber tight containers, such as fiber tight drums, is also acceptable. At a minimum, Nnon-friable waste also may be package d and shall be wetted and containerized in leak proof containers for delivery to a landfill that is licensed to accept non-friable asbestos waste. in large containers, such as dumpster or roll-offs Shredding, crushing, or any other form of volume reduction prior to placement in the landfill will render non-friable asbestos waste subject to the containerization requirements set forth in section 7.A(12)(a), as long as the container is lined with two (2) layers of 6 mil or one (1) layer of 12 mil polyethylene sheeting and secured fiber tight prior to transport and the ACM is maintained in a non friable state when placed in the dumpster. Fiber tight packaging must be maintained throughout storage, transport, and off loading at the landfill.

- (be) Work area polyethylene waste. Once visually clean, work area polyethylene sheeting must be removed and disposed of, either as asbestos or non-asbestos waste.

(13) Asbestos Waste Storage Requirements. On-site storage of asbestos waste, defined to be storage at the street address of the abatement site, is subject to the following requirements:

- (a) Waste must be stored in a secure container or area accessible to authorized persons only;
- (b) Waste packaging must be free of visible debris prior to placement in the storage area or storage container;
- (c) Waste must not remain on-site longer than five (5) days following completion of asbestos abatement activities; and
- (d) Waste must be tracked by written documents, such as bill of lading or manifest, evidencing the current location of the waste at any time prior to final disposal.

(14) Personal Decontamination Requirements.

- (a) An individual must decontaminate prior to exiting the regulated area. Personal decontamination shall be achieved by removing all clothing and footwear except a bathing suit, if worn, and thoroughly showering with soap and water at a contiguous or remote decontamination facility. Respirators must be worn into the shower unit, and washed and cleaned as part of the decontamination procedure. ~~Prior to proceeding from containment to a remote facility (which requires a standard variance), individuals must put on a clean, disposable suit over their contaminated suit and wear a respirator until entry to the shower unit.~~
- (b) Clothing or footwear used or worn in the regulated area must not leave the equipment room unless containerized for reuse inside a regulated area, cleaned, or disposed of. Clothing worn under protective suits and footwear must be designated for asbestos use only, be easily identifiable by sight and be permanently marked or labeled (minimum 3/4 inch lettering) as "Asbestos Clothing" on the outside of the clothing or footwear. Containerized clothing or footwear must be opened only inside a regulated area, excluding the clean room.
- (c) Only impervious materials such as rubber, polyethylene, etc., may be cleaned in the decontamination facility. Clothing and other pervious materials, such as leather boots, must be cleaned according to OSHA requirements.
- (d) Personal decontamination requirements for use with a remote decontamination unit.
 - (i) Each worker/supervisor shall be provided with appropriate personal protective and respiratory equipment as required by OSHA 1926.1101 effective August 10, 1994, including but not limited to, a half-face respirator (at a minimum) and a protective suit (e.g., tyvek) or designated "Asbestos Clothing". Wearing a bathing suit underneath disposable full body suits is allowed.
 - (ii) Each worker/supervisor shall don their appropriate personal protective equipment in a manner such that the protective suit (e.g. tyvek) can be removed while the respirator is still being worn.
 - (iii) Before proceeding to and entering into a regulated area, each worker/supervisor shall remove all street clothes and footwear in the clean room of the remote decontamination facility.
 - (iv) Workers/supervisors wearing "Asbestos Clothing" as provided in section 7.A(14)(b) shall change into their Asbestos Clothing in the equipment room, first donning their respirator in the clean room, before proceeding to the equipment room. In the equipment room they shall place a clean protective suit and booties over their Asbestos Clothing and shoes before proceeding to the regulated area. The protective suit and booties can then be removed once inside the regulated area.
 - (v) Each worker/supervisor shall be provided with a clean, unused suit to carry to the regulated area. This suit shall be left at the designated egress point into the regulated area to be used when exiting from the regulated area.
 - (vi) Exiting the regulated area

Each worker/supervisor shall first remove all visible debris from the protective suit and then shall put the new clean unused suit that was left at the designated egress point to the regulated area entryway over their contaminated suit before proceeding to either another work area or the decontamination facility equipment room where both suits shall be removed in unison. Respirators shall not be removed during this procedure and shall be worn at all times until they are removed in the shower room, during showering, as part of the decontamination process that must be performed at the conclusion of the day's shift or at any scheduled break period during the shift, including but not limited to, the lunch break.

(15) Equipment and Waste Decontamination Requirements.

- (a) All equipment, supplies, and materials, including properly containerized waste material, work area ventilation units, HEPA vacuums, vacuum hoses, water hoses, extension cords, ladders, etc., must be completely decontaminated and free of visible debris before removal from containment.
- (b) Where the size and/or shape of the equipment, supplies, and materials is such that decontamination is neither possible nor feasible (e.g., wood), then the object shall be properly containerized or wrapped in a minimum of two (2) layers of fiber-tight 6-mil polyethylene sheeting for disposal or reuse in an active containment, and cleaned of visible debris prior to removal from the regulated area.

(16) Decontamination of Work Area Ventilation Units.

- (a) A work area ventilation unit must have the exterior filter(s) removed, immediately wetted, and disposed of as asbestos waste before the unit is taken out of containment.
- (b) When the internal filter(s), including HEPA, of a work area ventilation unit are not changed upon project completion, the unit intake(s) and exhaust(s) must be wrapped fiber-tight with a minimum of two (2) layers of 6-mil polyethylene sheeting before removal from containment.
- (c) Internal filters must be removed inside an active containment, adequately wetted immediately upon removal from the unit, and disposed of as friable asbestos waste.

(17) Emptying of Vacuums. HEPA vacuums must be emptied in an active containment that includes an operating work area ventilation system and decontamination facility.

(18) Project Housekeeping.

- (a) Sweeping of dry ACM is prohibited.
- (b) All removed ACM must be containerized by the end of each workday.

(19) Existing Asbestos-Containing Debris in the Regulated Area. Visible asbestos-containing debris that is present on surfaces upon which the contractor will place polyethylene sheeting to establish the regulated area shall be cleaned up prior to conducting set-up, removal, or repair activities. The Asbestos Design Consultant must demarcate the regulated area, incorporate into the design any existing debris within the regulated area, and consider debris

part of the abatement activity. The Asbestos Abatement Contractor must remove existing asbestos-containing debris on all surfaces and components within the regulated area as part of abatement activity.

- (20) **Clean Up Requirements.** All visible dust and debris must be removed from the regulated area. The regulated area must be cleaned and dry, and surface coatings must not be applied to any surface within the regulated area, prior to conducting the first visual evaluation and subsequent air clearance sampling.
- (21) **Teardown.** Following the initial visual evaluation and receipt of acceptable air clearance sampling results, the contractor shall remove the containment, critical barriers, and the decontamination unit from the work site. The contractor shall clean up any visible dust or debris resulting from teardown activities prior to the final inspection after removal of containment in accordance with section 8.B(3) of this rule.
- (22) **Project Completion.** An asbestos abatement activity is not considered complete and acceptable for regulated area release until initial visual evaluation standard(s), standard(s) for visual evaluation at the final inspection, and final air clearance standards(s), (if applicable) have been met as set forth in these rules. All applicable work practice requirements set forth in this rule must continue to be implemented until the project is complete.
- ~~(23) **Procedures for wrap and cut activities.** When conducting wrap and cut activities, all asbestos-containing materials must be wet with water, and the whole component or pipe section must be wrapped with 2 layers of 6 mil polyethylene sheeting with overlapping seams secured with duct tape to create a fiber-tight container.~~

B. Alternative Work Practice Requirements for Demolition Activities. Except as allowed in section 7.B(3) of this rule, demolition of a building that contains ACM shall not commence until all ACM has been removed. A certified Design Consultant must specify materials to be removed and/or left in place for demolition activities conducted pursuant to this rule.

- ~~(+)(1)~~ Removal of ACM from a building being demolished must comply with the work practice requirements set forth in this section except that static clearances are allowed when dirty or dusty conditions not related to asbestos abatement activities exist ~~inside or outside~~ the regulated area that likely will result in count overloads to filter media. Static clearances are required when aggressive methods are not feasible. For buildings where demolition is scheduled to occur within 6 months of the asbestos abatement project and general access to the building will be restricted, the regulated area does not need to include work area containment as set forth in section 7.A(2)(a) of this rule. Air ventilation unit(s) shall be placed within the regulated area adjacent to active removal activities. If this is not feasible, the asbestos abatement contractor shall submit a non-standard variance to the Department stating the reason(s) for not placing unit(s) within the regulated area.
- (2) Prior to beginning a partial demolition project where asbestos will be impacted, the remaining section(s) of the building adjacent to the asbestos demolition must be isolated with a minimum of two (2) layers of fiber-tight 6-mil polyethylene sheeting, and HVAC equipment in or passing through the demolition area must be isolated with the 6-mil polyethylene sheeting.
- (3) **Demolition by Large Equipment of Buildings Containing Intact Flooring Materials.** Intact asbestos-containing flooring, ~~roofing, gasketing and packing materials~~ does not require

removal prior to demolition by large equipment (such as bulldozers with rakes, top loaders, backhoes, skid loaders/bobcats, hydraulic excavators, cranes with wrecking balls, clamshells, or buckets, and other similar machinery), provided that a non-standard variance request is approved by the Department and the following alternative work practices, as cited in (a) through (g) below, are implemented. Contractors performing these operations must be licensed by the Department. Employees performing the work must be certified by the Department. OSHA training shall be documented and copies of these training certificates shall be at the asbestos work site for any supervisors and workers certified under the certification-by-rule provision of section 5.A(2) of this rule. A licensed consultant must document in writing that all flooring material is intact and that the contractor performing the demolition activity is licensed in accordance with the requirements of this section

(3)

~~If the owner wants to leave intact asbestos-containing flooring in place during demolition by large equipment, a licensed consultant must submit a non-standard variance request to the Department in accordance with section 7.F of this rule. This variance request must verify that all remaining acm is intact and that the following requirements will be met when the building is demolished by large equipment:~~

- (a) A regulated area must be established.
- (b) The project must be conducted in a manner that minimizes the release of asbestos fibers. All necessary and appropriate measures must be taken to ensure that release of asbestos fibers is minimized. The ACM must be kept wet at all times during the demolition, on-site storage, transportation, and disposal activities. If visible emissions are observed during demolition of an area with asbestos-containing materials, work shall cease until engineering controls are in place to prevent such visible emissions.
- (c) Employees within the regulated area must be trained consistent with OSHA 29 CFR Part 1926.1101 (effective August 10, 1994). Training shall be documented, and the training documentation shall be made available immediately to the Department at the work site.
- (d) Employees within the work area must wear appropriate personal protective equipment, including a minimum of a 1/2-faced respirator equipped with HEPA filters and full body coverings, including hand and foot coverings.
- (e) Asbestos waste must be containerized in leak proof transport vehicles and securely covered during transport. Waste may be segregated into asbestos waste and non-asbestos waste as needed to meet disposal facility requirements.

Note: Unless the asbestos-containing flooring is separated from all other demolition debris generated by the demolition activity, all of the demolition debris from the activity must be disposed of as asbestos waste.

- (f) Disposal of asbestos-containing demolition debris must occur at a landfill licensed to accept construction/demolition debris or asbestos waste. The non-friable asbestos waste must be containerized in accordance with section 7.A(12)(b).
- (g) A visual evaluation of the regulated area must be performed in accordance with section 8.B prior to the release of the regulated area.

C. Additional Requirements for Enclosure and Encapsulation Activities. Enclosure and encapsulation activities are considered to be asbestos abatement activities for purposes of these rules and are subject to the work practice requirements of section 7.A of this rule and the following:

- (1) Enclosure. Enclosures must be labeled or identified in the permanent building records to indicate the presence of ACM within them.
- (2) Encapsulation. Liquid penetrating encapsulants must be applied with airless spray equipment, brushes, or rollers and in accordance with the manufacturer's recommendations. Liquid encapsulants must not be applied to damaged or deteriorated ACM except to seal pipe ends during a glove bag operation or during repair operations. A bridging encapsulant (including rewettable cloth and a pliable heat-resistant mastic) only shall be applied over damaged thermal system insulation.

D. Alternative Work Practice Requirements for Roofing and Exterior Asbestos-Containing Cementitious Products Projects. This section establishes work practice requirements for roofing projects involving more than 105 square feet of asbestos-containing roofing materials that are removed by mechanical roof saws or cutters. It also establishes work practice requirements and for projects involving exterior asbestos-containing cementitious products removal projects. Contractors performing these operations must be licensed by the Department. Employees performing the work must be certified by the Department. OSHA training shall be documented and copies of these training certificates shall be at the asbestos work site for any supervisors and workers certified under the certification-by-rule provision of section 5.A(2) of this rule. This documentation must be made immediately available to the Department upon request. Required work practices include:

- (1) Roofing. Roofing projects involving the removal of asbestos-containing roofing materials by mechanical roof saws or cutters are subject to the following requirements:
 - (a) At least one on-site employee must be trained as a competent person;
 - (b) A regulated area must be established. ~~The work area must include a regulated area,~~ except that containment, a ventilation system, critical barriers, and a waste load out area are not required, and a remote decontamination unit is allowed;
 - (c) HVAC intakes and exhausts inside the work area must be isolated and sealed with fiber-tight (six) 6-mil polyethylene sheeting;
 - (d) Workers performing the cutting and cleaning operations must wear appropriate personal protective equipment as prescribed by 29 CFR 1926.1101 (effective August 10, 1994), including, at a minimum, 1/2 faced-respirator equipped with HEPA filters and full body coverings;
 - (e) Workers must comply with the personal decontamination requirements of section 7.A(14) of this rule.
 - (ef) The roof cutter must be equipped with an operational blade cover;
 - (gf) The roof cutter must be continuously misted during operation;

- (gh) The tailings from the roof cutter ~~must~~shall be kept wet and cleaned up by HEPA vacuuming or wet-wipe techniques;
 - (hi) The roof area being abated or cut ~~must~~shall be kept wet at all times;
 - (ij) The tailings, and any other friable-asbestos waste, ~~must~~shall be containerized and stored in accordance with section 7.A(11) and 7.A(12)(a) of this rule by the end of each work day;
 - (kj) The non-friable waste, including the small sections of cut (not torn) built up roofing, ~~must~~shall be containerized in accordance with section 7.A(12)(b);
 - (kl) Prior to de-regulating the regulated area, ~~release~~, the regulated area ~~must~~shall be cleaned and meet the visual evaluation standard of section 8.B(1) of this rule;
 - (ml) Visual evaluation of each regulated ~~area~~activity (daily cutting, cleaning, and removal operations) is required, but air clearances are not required. Visual evaluations on roofs ~~must~~shall be conducted by an Asbestos Project Supervisor, Air Monitor, or OSHA trained competent person, and are not subject to the "Conflict of Interest" provisions of section 2.G of this rule; and
 - (m) ~~Employees must comply with the personal decontamination requirements of section 7.A(14) of this rule.~~
- (2) Exterior asbestos-containing cementitious products. Siding or other projects involving exterior asbestos-containing cementitious products ("transite") are subject to the following requirements:
- (a) At least one on-site employee ~~must~~shall be trained as a competent person;
 - (b) A regulated area ~~must~~shall be established, except that a containment, a ventilation system, critical barriers, and a waste load out area are not required, and a remote decontamination unit is allowed;
 - (c) Appropriate personal protective equipment ~~must~~shall be utilized while inside the regulated area, consisting of 1/2 face-respirator equipped with HEPA filters and full body coverings, including head and foot coverings;
 - (d) Workers shall comply with the personal decontamination requirements of section 7.A(14) of this rule.
 - (ed) The material ~~must~~shall be thoroughly wetted before and during the removal to ensure prompt wetness (especially back side) and ensure that it stays wet during removal, storage, and transport to the landfill;
 - (fe) The material ~~must~~shall be removed as whole as possible and carefully lowered, not dropped, to the ground;
 - (fh) The cementitious product ~~asbestos waste must~~shall be containerized in accordance with section 7.A(12)(b).

(g) Prior to deregulating the regulated area, the regulated area shall be cleaned and meet the visual evaluation standard of section 8.B(1) of this rule

(i) Visual evaluation of each regulated area activity is required, but air clearances are not required. Visual evaluations on cementitious siding must shall be conducted by an Asbestos Project Supervisor, Air Monitor, or OSHA-trained competent person, and are not subject to the "Conflict of Interest" provisions of section 2.G of this rule; and

(h) Employees must comply with the personal decontamination requirements of these rules.

E. Alternative Work Practice Requirements for Glove bag Operations and Wrap and Cut Projects. This section establishes the work practice requirements for the following:

Removal of components covered with thermal system insulation that utilizes "wrap and cut" methods;

Removal or repair of asbestos-containing materials that involve use of multiple non-contiguous glovebags that are no larger than 60 inches by 60 inches; and

Removal or repair, using contiguous glovebags, that involve a total of no more than 30 linear feet of asbestos-containing materials on a single pipeline, or any amount of asbestos-containing materials that can be removed within 10 glovebags for pipelines running parallel to each other.

Glove bag and Wrap and Cut projects are subject to Section 2(G), Conflict of Interest, and 8(B), Release of the Regulated Area, requirements as determined by the total amount of asbestos containing material to be removed during the project as indicated on the notification form section 12.

A certified Asbestos Inspector or Design Consultant shall evaluate the component(s), to determine that the component(s) is intact and not likely to release fibers during removal. The determination shall be in writing and shall be recorded in the project design.

1. Glove Bag Operations

(a) Remove or cover with a single layer of 6-mil poly movable objects within the proposed regulated area;

(b) Cover immovable objects within the proposed regulated area with a single layer of 6-mil poly;

(c) Establish critical barriers (where applicable) and demarcate the regulated area with barrier tape marked "asbestos hazard".

(d) Establish a decontamination facility contiguous with the regulated area.

(e) Conduct glove bag removals using recognized glove bag removal techniques;

(f) Conduct a visual evaluation by certified air monitor of the completed glove bag removal before the glove bag is removed per Section 8(B)(1)(a),(c),(g)(i).

(g) Remove glove bags from pipes/components; and

(h) Remove the glove bags from the regulated area

(2) Wrap and Cut Operations requiring the use of glove bags

(a) Perform work area preparation as described in Section 7.E(1)(a-d) above;

(b) Wet the component/pipes with water;

(c) Wrap the component/pipes with 2 layers of 6-mil polyethylene sheeting, overlapping the seams and securing with duct tape creating a fiber-tight container;

(d) Conduct glove bag removals at appropriate intervals using recognized glove bag removal techniques;

(e) Conduct a visual evaluation by certified air monitor of the completed glove bag removal and wrapping operation before the glove bag is removed per Section 8(B)(1)(a)-(c)-(g)-(i).

(f) Remove glove bags and cut exposed pipe using appropriate method; and

(g) Remove the glove bags and wrapped pipes/components from the regulated area.

(3) Work practice requirements for wrap and cut projects not requiring the use of glove bags.

(a) Perform work area preparation and component removal wrapping as described in Section 7.E(1)(a-d) set forth above;

(b) Conduct a visual evaluation by certified air monitor of the completed wrapping operation before the pipe/component is cut;

(c) Cut the component(s) as applicable; and

(d) Remove the wrapped pipes/components from the regulated area.

E. ~~Waste Shipment Records.~~ For all asbestos-containing waste material transported off the facility site, the operator must:

~~(1) Maintain waste shipment records and include the following information:~~

~~(a) The name, address, and telephone number of the waste generator.~~

~~(b) The name and address of the local, State, or EPA Regional office responsible for administering the asbestos NESHAP program.~~

~~(c) The approximate quantity of waste, measured in cubic meters (cubic yards).~~

~~(d) The name and telephone number of the disposal site operator.~~

~~(e) The name and physical site location of the disposal site.~~

~~(f) The date transported.~~

~~(g) The name, address, and telephone number of the transporter(s).~~

~~(h) A certification that the contents of this consignment are fully and accurately described by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and government regulations.~~

~~(2) Provide a copy of the waste shipment record, as described above, to the disposal site owners or operators at the same time as the asbestos containing waste material is delivered to the disposal site.~~

~~NOTE: For non friable asbestos waste only, a copy of the Maine Department of Environmental Protection Non Hazardous Waste Transporter Manifest for Category A waste may be used to meet this waste shipment records requirement. The licensed non hazardous waste transporter is required to complete and maintain this manifest form and to provide a copy to the disposal facility; asbestos abatement contractors may request a copy of this form from the transporter.~~

~~(3) In instances in which a waste shipment record, signed by the owner or operator of the designated disposal site, is not received by the waste generator within 35 days of the date the waste was accepted by the initial transporter, the operator must contact the transporter and/or the owner or operator of the designated disposal site to determine the status of the waste shipment.~~

~~(4) Report in writing to the local, State, or EPA Regional office responsible for administering the asbestos NESHAP program for the waste generator if a copy of the waste shipment record, signed by the owner or operator of the designated waste disposal site, is not received by the waste generator within 45 days of the date that the waste was accepted by the initial transporter. The report must include the following information:~~

~~(a) A copy of the waste shipment record for which a confirmation of delivery was not received, and~~

~~(b) A cover letter signed by the waste generator explaining the efforts taken to locate the asbestos waste shipment and the results of those efforts.~~

~~(5) Retain a copy of all waste shipment records, including a copy of the waste shipment record signed by the owner or operator of the designated waste disposal site, for at least 2 years.~~

~~(6) Furnish upon request, and make available for inspection by the Department, all records required under this section.~~

GF. Non-standard Variances To Work Practice Requirements. Non-standard Variances to the work practices requirements of this section may be permitted when the standard procedure is not practicable, not feasible, not safe, or when a cost saving alternative exists and the proposed non-standard work practice variance adequately protects both human health and safety, as well as the environment, from exposure to asbestos hazards.

~~Variance proposals, both standard and non-standard work practices, must be developed by a certified Design Consultant and must be sent in writing to the Department with the original notification form unless unforeseeable conditions occur during the project that warrant a variance request at that time. The non-standard work practice must present clear and convincing evidence that the asbestos project is distinctive in some way and the proposed alternative(s) to required work practices will comply with the intent of State law and these rules. Where applicable, the design consultant submitting the non-standard work practice must notify the Asbestos Design Consultant who prepared the original project design for the project of the non-standard work practice(s) submission to the Department. This notification must be concurrent with the non-standard work practice submission to the Department.~~

~~Non-standard work practices require written authorization from the Department prior to implementation. The Department will respond to non-standard work practice requests within 5 working days of receipt and will indicate whether the proposal is authorized or not, and if not, why not.~~

~~Standard variances consistent with section 7.F(1) of this rule and submitted with the original notification are automatically granted unless the Department notifies the Design Consultant prior to the start of the project. Standard variances submitted during or before the project due to unforeseeable conditions may not be implemented until 5 days after the variance is received by the Department unless otherwise approved by the Department. Non-standard variances are those other than standard variances listed below and require written authorization from the Department prior to implementation. The Department will respond to non-standard variance requests within 5 working days of receipt and will indicate whether the proposal is authorized or not, and if not, why not.~~

~~The Department can revoke a non-standard work practice variance approval whenever additional information is obtained or a change in project conditions occurs.~~

~~(1) Standard Variances. Standard variances include:~~

~~(a) Wetting ACM not required. A variance to wetting ACM during removal is allowed:~~

- ~~(i) When the temperature inside the regulated area is below 32°F and heating the area is neither feasible nor practical (e.g., abandoned warehouse or roof);~~
- ~~(ii) When electrical conditions exist that are noted in the design plan and demarcated in the specific work area, and that would render that specified area hazardous to shock and/or electrocution hazards; or~~
- ~~(iii) When operational high pressure steam lines are being abated or repaired.~~

~~NOTE: When a variance to wetting ACM during removal is granted, ACM must still be adequately wet during storage, transport, and disposal.~~

~~(b) Exhausting negative air machines (NAMs) to ambient (outside) air not feasible. A variance is allowed when it is not feasible to exhaust to the ambient air because the distance is too great from the regulated area to the outside of the building (e.g., large industrial building or warehouse) or when health and safety concerns, such as egress from an area with limited access, override the need to exhaust to the ambient air or when outside access is not feasible.~~

~~(c) Aggressive air clearances not required in dirt crawl spaces. When a regulated area is in a dirt crawl space, a variance is allowed when dirty or dusty conditions not related to asbestos abatement activities exist inside or outside the regulated area and will likely result in count overloads to filter media. Static clearances are required when aggressive methods are not feasible.~~

~~(d) Containment and air clearances not necessary. A variance to establishing containment and performing air clearances on a project is allowed when any of the following situations apply:~~

~~(i) Enclosure activities that do not impact ACM;~~

~~Removal of components covered with thermal system insulation that utilize "wrap and cut" methods, provided that a certified Asbestos Inspector has evaluated the component(s), has determined it to be in good condition and not likely to release fibers during removal, and has recorded this determination in the project design;~~

~~(10) Removal or repair of asbestos-containing materials that involve use of multiple non-contiguous glovebags that are no larger than 60 inches by 60 inches; and~~

~~(11) Removal or repair, using contiguous glovebags, that involve a total of no more than 30 linear feet of asbestos-containing materials on a single pipeline, or any amount of asbestos-containing materials that can be removed within 10 glovebags as specified in (iii) above for pipelines running parallel to each other.~~

~~NOTE: When a containment variance is granted, the regulated area still must be established and visual evaluations must be conducted in accordance with Sections 2.G and 8.B of this rule.~~

~~(e) Remote decontamination unit needed. An explanation for the use of a remote decontamination unit must be included with the request for this standard variance.~~

~~(f) Smaller than standard decontamination unit needed in residential structure. A variance to the requirements for minimum decontamination unit size is allowed in residential structures where construction of a decontamination unit meeting minimum size requirements is not possible due to room size and configuration, HVAC system component locations, or restriction of safe egress for residents.~~

~~(2) Non-Standard Variances. Non-standard variances, including any variance not cited above and demolitions by large equipment, require written approval from the Department prior to implementation of the variance. A Design Consultant must send a written variance request with accompanying justification to the Department as part of the original notification unless unforeseeable conditions occur during the project that warrant a variance request at a later time. The justification must present clear and convincing evidence that the asbestos project is distinctive in some way and the proposed alternative(s) to required work practices will comply with the intent of State law and these rules.~~

NoteOTE: When given a non-standard work practice authorization, variance, the abatement contractor still must comply with all other applicable provisions of this rule and other state and federal rules and regulations.

F. Waste Shipment Records. For all asbestos-containing waste material transported off the facility site, the operator shall:

(1) Maintain waste shipment records and include the following information:

- (a) The name, address, and telephone number of the waste generator.
- (b) The name and address of the local, State, or EPA Regional office responsible for administering the asbestos NESHAP program.
- (c) The approximate quantity of waste, measured in cubic meters (cubic yards).
- (d) The name and telephone number of the disposal site operator.
- (e) The name and physical site location of the disposal site.
- (f) The date transported.
- (g) The name, address, and telephone number of the transporter(s).
- (h) A certification that the contents of this consignment are fully and accurately described by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and government regulations.

(2) Provide a copy of the waste shipment record, as described above, to the disposal site owners or operators at the same time as the asbestos-containing waste material is delivered to the disposal site.

Note: For non-friable asbestos waste only, a copy of the Maine Department of Environmental Protection Non-Hazardous Waste Transporter Manifest for Category A waste may be used to meet this waste shipment records requirement. The licensed non-hazardous waste transporter is required to complete and maintain this manifest form and to provide a copy to the disposal facility; asbestos abatement contractors may request a copy of this form from the transporter.

(3) In instances in which a waste shipment record, signed by the owner or operator of the designated disposal site, is not received by the waste generator within 35 days of the date the waste was accepted by the initial transporter, the operator must contact the transporter and/or the owner or operator of the designated disposal site to determine the status of the waste shipment.

(4) Report in writing to the local, State, or EPA Regional office responsible for administering the asbestos NESHAP program for the waste generator if a copy of the waste shipment record, signed by the owner or operator of the designated waste disposal site, is not received by the waste generator within 45 days of the date that the waste was accepted by the initial transporter. The report must include the following information:

- (a) A copy of the waste shipment record for which a confirmation of delivery was not received, and
- (b) A cover letter signed by the waste generator explaining the efforts taken to locate the asbestos waste shipment and the results of those efforts.
- (5) Retain a copy of all waste shipment records, including a copy of the waste shipment record signed by the owner or operator of the designated waste disposal site, for at least 2 years.
- (6) Furnish upon request, and make available for inspection by the Department, all records required under this section.

8. Monitoring Requirements and Requirements for Release of the Regulated Area.

A. Monitoring Requirements. Asbestos abatement activities are subject to the following air and project monitoring requirements:

- E.(1) Air Monitoring. Air monitoring, in the form of air clearance sampling, must be conducted for all asbestos abatement activities. A project specific air monitoring plan, including the mandatory air clearance sampling and optional additional area monitoring, must be developed and used for each project and the plan must be part of the project design. Any change(s) to the air monitoring plan must be made by a certified Asbestos Air Monitor or Asbestos Abatement Design Consultant and must become part of the project documentation. The air monitoring plan must be designed in accordance with these rules by an Air Monitor or Asbestos Abatement Design Consultant who has an independent business relationship with the asbestos abatement company performing the project whenever independent air clearances are required.
- (2) Project Monitoring. Project Monitoring is not required by these rules but may be required due to contractual or other arrangement or specification. If an asbestos abatement activity is monitored, then written records of all project monitoring activities shall be maintained at the project site for the duration of the project and shall become part of each owner's and operator's official records for that project. This project monitoring documentation must be provided to the building owner within 6 months of project completion.
- (3) Analysis. Air samples collected for air clearance sampling must be analyzed by a Department-licensed Asbestos Analytical Laboratory as follows:
 - (a) Each air sample collected shall be analyzed, as per the licensing section of this rule, by phase contrast microscopy (PCM) or transmission electron microscopy (TEM), or other Department US EPA-approved method; and
 - (b) For air sample analyses, results obtained from the TEM methodology, described in Appendix A to Subpart E, 40 CFR part 763, and shall be considered definitive when results differ.

C.B. Release of Regulated Area. A regulated area may not be released from the contractor's control until no visible debris remains in the regulated area, visual evaluations are completed, air clearance sampling in accordance with this section is conducted, and clearance standards are met. Visual evaluations and air clearances for an asbestos abatement project involving more than 100 linear/and/or square feet, or any combination thereof, of ACM must be performed by an Asbestos Consultant.

Visual evaluations and air clearance sampling must be conducted by a certified Asbestos Air Monitor employed by an Asbestos Contractor, In-house Asbestos Abatement Unit, or Asbestos Consultant.

The following procedures shall be performed sequentially and documented:

(1) Visual Evaluation of Regulated Area. Following final abatement activities, including final clean and removal of equipment, supplies, and waste, and prior to removal of any layer of containment (if applicable) or glovebag and before conducting air clearance sampling, a visual evaluation of the regulated area shall be conducted, as specified below, to ensure that there is no visible dust or debris is present and that in the regulated area, including the containment, is dry. The regulated area must be completely dry prior to conducting the visual evaluation.

The individual conducting the visual evaluation where there is a containment or glovebag shall:

~~(a) Enter the regulated area where the asbestos abatement activity was performed;~~
(a) Inspect the decontamination facility (including remote decontamination facilities) and waste load-out unit (where applicable) to ensure there is no visible dust or debris present.

~~(ab) Enter the regulated area/containment where the asbestos abatement activity was performed;~~

~~(bc) Get close enough to see and touch the surfaces from which the ACM was removed or on which other abatement operations were performed;~~

~~(ed) Inspect the surfaces from which the ACM was removed;~~

~~(de) Observe and touch the substrate;~~

~~(ef) Examine the permanent features of the regulated area such as walls, conduits, pipes, ceiling tile grid bars, ducts, etc.;~~

~~(fg) Examine the floor, walls, and other surfaces of the regulated area;~~

~~(gh) Examine decontamination and waste-load out facilities;~~

~~(hi) Examine places where the polyethylene sheeting may have fallen away from the walls or partitions;~~

~~(ij) Examine the polyethylene floor coverings to determine whether visible debris and/or contaminated water may have seeped through the plastic layers;~~

~~(j) Document in the daily project log the time that the regulated area was determined to be free of visible debris so that air clearance sampling could commence; and~~

~~(k) The containment must be completely dry prior to conducting the visual evaluation.~~

If debris is observed, the regulated area must be cleaned and another visual evaluation conducted. Project documents must reflect these recleaning activities(ies).

The Air Monitor Air clearance sampling must ensure not begin until that the regulated area is free of visible debris before conducting air clearance sampling.

The Air Monitor must document in the daily project log the time that the regulated area was determined to be free of visible debris so that air clearance sampling could commence

F-(2) Air Clearance Sampling. Air clearance sampling must be performed and documented in accordance with this rule.

Air clearance sampling is subject to the following requirements:

(a) The containment must be completely dry prior to conducting air clearance sampling.

(b) Immediately prior to conducting air clearance sampling, the Air Monitor shall implement aggressive sampling by sweeping the walls, ceiling and floor with the exhaust of a minimum one(1) horsepower leaf blower. Stationary fans shall then be placed in locations which will not interfere with air sampling equipment. Fan air shall be directed to the ceiling. One fan shall be used for each 10,000 square feet of regulated area floor area and shall run throughout the air clearance sampling event. Aggressive sampling is not required when a regulated area is in a dirt crawl space or when dirty or dusty conditions not related to asbestos abatement activities exist outside the regulated area and will result in rendering filter media unreadable. Static air clearances samples are required when aggressive sampling is not appropriate.

(b) The total fiber count of each of the samples collected in the work area must be less than or equal to 0.010 f/cc (fibers per cubic centimeter) of air (as analyzed by phase contrast microscopy), must be less than or equal to 70 s/mm² (structures per square millimeter) by transmission electron microscopy, or must be below the clearance criteria for another Department approved method(s) to be considered acceptable for release of the work area.

(c) The minimum number of air clearance samples is as follows:

(i) 2 samples for activities that contain less than 100 linear-and/or-square feet, or any combination thereof, total of ACM;

(ii) 3 samples for activities that contain more than 100 but less than 1,000 linear-and/or /square feet or any combination thereof total of ACM;

B-(iii) 5 samples for activities greater than 1,000 linear-and/or-s/square feet total or any combination thereof of ACM; and

(d) PCM air clearance samples must contain at least 2452 liters of air and the sampling flow rate must not exceed 16 liters of air per minute.

(e) Notwithstanding the above, for asbestos abatement projects conducted in schools, the number and flow rate of the air clearance samples must be in accordance with the requirements of 40 CFR Part 763, Subpart E

(e) Air clearance samples must be collected utilizing aggressive techniques, that are consistent with 40 CFR, Part 763, Subpart E (effective date December 14, 1987

~~(f) Failures of air clearance sampling (not meeting the clearance criteria of 0.010 f/cc or 70 structures/mm²) require that the responsible party:~~

~~(i) Reclean the work area until it meets the air clearance standards of this section;~~

~~Resample by transmission electron microscopy to obtain a clearance as per the Asbestos Containing Materials in Schools rule, 40 CFR Part 763 (effective October 30, 1987); or~~

~~Exclude potentially contaminated make-up air and resample.~~

~~(gf) Air clearance samples shall be analyzed as follows:~~

~~(e)(i) For asbestos abatement projects in schools that impact more than 160 square feet or 260 linear feet of asbestos-containing material, air clearance sample analysis must be in accordance with the requirements of 40 CFR, Part 763, Subpart E, Appendix A (effective December 14, 1987); or~~

~~(e)(ii) For all other projects, air clearance sample analysis must be in accordance with Appendix A (referenced above), the most current version of NIOSH (National Institute for Occupational Safety and Health) Methods 7400 or 7402, as applicable; the OSHA Reference Method Asbestos Standard for General Industry, 29 CFR 1910.1001 Appendix A (effective date July 20, 1986) for personal air samples, or other approved Department-approved EPA analytical methodology.~~

~~(iii) The total fiber count of each of the air clearance samples collected inside the regulated area must be less than or equal to 0.010 f/cc (fibers per cubic centimeter) of air (as analyzed by phase contrast microscopy), or must be less than or equal to 70 s/mm² (structures per square millimeter) by TEM (transmission electron microscopy, or must be below the clearance criteria for another Department-approved method(s) to release the work area.~~

~~(fg) Failures of air clearance sampling (not meeting the clearance criteria of 0.010 f/cc or 70 structures/mm²) require that the asbestos abatement contractor:~~

~~(i) Wet wash and HEPA vacuum the entire regulated area;~~

~~Note: Potentially contaminated make-up air may be pre-filtered and/or excluded from entering the regulated area prior to re-cleaning the entire regulated area.~~

~~(ii) Resample and reanalyze either by NIOSH 7400, or NIOSH 7402 (TEM) or AHERA TEM 40 CFR Part 763 (effective October 30, 1987); and;~~

~~Note: School projects must follow the AHERA sampling and analysis protocols~~

~~(iii) Repeat wet washing, HEPA vacuuming and re-sampling until the air clearance standards of this section are met.~~

(3) Final Inspection after Removal of Containment. Immediately upon completion of removal of the containment of the regulated area, an Asbestos Air Monitor or Asbestos Project

Supervisor must visually inspect all surfaces within the regulated area for visible debris. If there is no containment, then the visual evaluation of regulated area shall be consistent with section 8.B(1) of this rule. If visible debris is observed, the regulated area must be cleaned by HEPA vacuum or wet methods until there is no visible dust or debris present. This final inspection must be documented in the daily project log. This documentation must include a statement that the regulated area was clear of visible debris and the name and signature of the person conducting this final inspection.

9. Permit-by-Rule for Asbestos Waste Storage Facilities

A. General Requirements. Prior to disposal off the site of generation, asbestos waste may be stored by a business or public entity in quantities greater than one (1) cubic yard only at a Department-licensed Asbestos Waste Storage Facility permitted under the provisions of this section.

-B. Location. An Asbestos Waste Storage Facility (AWSF) must not be located within 500 feet of any public or private school, day care or pre-school, or any other such building utilized for the education of students in grades K through 12. A variance of this requirement may be granted by the Department under extenuating circumstances where pre-existing storage facilities are currently located within 500 feet of educational facilities described in this section and no other feasible storage alternative exists. Also, the ASWF must be located on property in which the licensee has title, right or interest.

C. General Application Requirements. A business or public entity that operates or intends to operate an AWSF must apply to the Department for a permit by rule to operate an AWSF at least 60 days prior to the operation of the AWSF. A licensee must notify the Department at least 14 days in advance whenever it will cease operating its permitted AWSF. Moving an AWSF to a new location requires submitting a new permit by rule application except that there is no 14 day waiting period prior to using the AWSF after the Department has approved the application. A business or public entity that obtains an AWSF permit by rule pursuant to this section need not obtain a solid waste storage facility permit pursuant to Maine's *Transfer Stations and Storage Sites for Solid Waste Rules*, 06-096 CMR 402 of the *Maine Solid Waste Management Regulations*.

D. Application Procedures. For approval as an AWSF, the following information must be submitted by the applicant on a Department form:

- (1) Applicant's name, address, telephone number, contact person, and responsible person with signature;
- (2) Anticipated annual asbestos waste volume based upon previous operational data or any other relevant data;
- (3) General description of the AWSF including its location;
- (4) Site plans, including but not limited to:
 - (a) Facility boundaries;

- (b) Location of the AWSF;
 - (c) Site security systems;
 - (d) Fences and gates; and
 - (e) Existing structures within 500 feet of the AWSF boundary lines with owner(s) name(s) and address(es).
- (5) Most recent full-sized US Geological Survey topographic map (7 1/2 minute if available) or other similar map detailing the property; and
- (6) An AWSF Operations Manual as set forth below.

E. AWSF Operations Manual Requirements.

- (1) The AWSF operator must prepare and maintain an Operations Manual regarding the day-to-day operations of the AWSF.
- (2) The AWSF operator is responsible for ensuring that persons involved in the day-to-day operation of the AWSF are familiar and comply with the Operations Manual and the requirements of this section.
- (3) The AWSF Operations Manual must be submitted to the Department with the permit by rule application and must include procedures to ensure the following requirements are met:
 - (a) The AWSF must be locked and impact resistant;
 - (b) The waste must be packaged in a minimum of 2 layers of (six) 6-mil polyethylene sheeting and be fiber-tight, as required by these rules;
 - (c) Asbestos waste must be adequately wet during storage;
 - (d) AWSF labeling (placarding) and asbestos waste labeling must be in accordance with OSHA's 29 CFR 1926.1101 (effective August 10, 1994);
 - (e) Containerized asbestos waste must not be dropped or thrown further than three feet, and caution and due care must be utilized during asbestos waste handling;
 - (f) Asbestos waste that is leaking or improperly packaged must be immediately repackaged. Dry asbestos waste must be immediately repackaged under controlled abatement conditions complete with negative pressure ventilation; and
 - (g) Site security procedures must prevent unauthorized persons from entering the AWSF.
 - (h) Asbestos waste must be removed from the site and transported to a licensed disposal facility at least once per year.

10. Approval and Conduct of Training Courses. This section includes the requirements for training courses used by an individual to meet certification requirements of this rule and for approval of training courses by a Training Provider.

A. Approval of Training Courses

- (1) A training course used by an individual to fulfill certification requirements must be approved by the Department or by another governmental agency that has a reciprocal arrangement with the Department. Individuals are responsible for ensuring that a training course is approved before taking the course. Courses approved by another state or the US EPA may or may not be approved by the Department depending upon the length, content, and presentation of the course and the qualifications of the training provider. Department approval of a training course expires after one year.
- (2) An application for training course approval must be submitted to the Department at least 30 days prior to the first scheduled training course date on forms approved by the Department.
- (3) Training course curriculum and operational procedures used by the Training Provider must adhere to the US EPA Asbestos Model Accreditation Plan; Interim Final Rule, 59 FR 5236-5260 (effective April 4, 1994), Appendix C to Subpart E of 40 CFR Part 763, "Asbestos-Containing Materials in Schools" rule (effective December 14, 1987). Initial and refresher training courses are subject to the Interim Final Rule.
- (4) If a training course is not referenced in Appendix C to Subpart E of 40 CFR Part 763, "Asbestos-Containing Materials in Schools" rule, the Department shall determine adequacy of the course by reference to industry standards, training offered by other trainers, the requirements of this section, and other material requested from the applicant.
- (5) Course content for the 16-hour Asbestos Air Monitor course that may be used in conjunction with a supervisor course to attain certification as an Asbestos Air Monitor must include at a minimum:
 - (a) Air sampling procedures, strategies, and equipment;
 - (b) Pump calibration techniques;
 - (c) Air sampling calculations;
 - (d) Limitations of air sampling;
 - (e) Appendix A of Asbestos-Containing Materials in Schools rule, 40 CFR Part 763 (effective October 30, 1987), including NIOSH methods;
 - (f) Response action clearances;
 - (g) Required recordkeeping and documentation;
 - (h) Applicable state and federal rules and regulations, including but not limited to this rule, NESHAP, EPA, and OSHA;
 - (i) Quality assurance procedures;
 - (j) Duties and responsibilities of a certified Asbestos Air Monitor, as set forth in this rule and other applicable rules and regulations;

- (k) Project monitoring techniques;
 - (l) Visual evaluation techniques;
 - (m) Visual clearances as per this rule and the American Society for Testing and Materials ASTM Method E 1368-90; and
 - (n) Reading and interpreting specifications and drawings.
- (6) Course content for an initial Asbestos Air Analyst must include techniques and procedures for quantification of fibers in air samples and at a minimum cover all topics presented in the former NIOSH Course #582, "Sampling and Evaluation of Airborne Asbestos" or equivalent.
- (7) The Asbestos Air Monitor refresher course shall be 4 hours.
- (8) 8-Hour OSHA Worker and 12-hour OSHA Competent Person course content must include: subject matter required by OSHA, pursuant to 29 CFR 1926.1101 (effective August 10, 1994), as well as proper clean-up techniques, visual evaluation of the work area, proper waste packaging, and work stoppage criteria.

B. Application Requirements for Approval of Training Courses. An applicant for approval of a training course must provide the following:

- (1) The name, address, telephone number, and license number of the DEP-licensed Training Provider conducting the training course, including, if applicable, any other name under which the Training Provider is known;
- (2) The name of the training course for which approval is sought;
- (3) A course curriculum detailing specific topics to be covered along with allotted topic times;
- (4) A copy of the training course manual along with all printed material;
- (5) A description of the teaching methods to be utilized, including but not limited to a description of audio/visual aids;
- (6) A description of the "hands-on" facility to be utilized, including, but not limited to, protocol for instruction and ensuring direct contact with actual situations encountered in the field of study;
- (7) A statement that the student to instructor ratio for hands-on portions will be no greater than 10 to 1;
- (8) A description of the equipment that will be utilized in classroom lectures and in hands-on training;
- (9) The names, background, qualifications, and training and experience of the primary instructor and the names and qualifications of all secondary instructors providing the training;
- (10) A copy of the uniquely numbered certificate of course completion, which must contain the following:
 - (a) The name of the student;

- (b) The name of the training course completed;
 - (c) The date(s) and location of the training course;
 - (d) The certificate's date of expiration;
 - (e) A statement that the student passed the examination;
 - (f) The name, address, and telephone number of the Training Provider;
 - (g) The length of the course in hours; and
 - (h) The name and signature block of the primary instructor for the course.
- (11) Other information necessary to determine the adequacy of the training course content and presentation;
- (12) Any other state or jurisdiction under which the course may be approved;
- ~~(13) A physical description of the training facility, including dimensions, that demonstrates that it is adequate for training and learning purposes; and~~
- ~~(14) A copy of the bank of questions the training provider will use to create the final course exams, a description of the process to be used for creating different versions of the final exam from the bank of questions, a sample exam, and a description of the system to be used to track which versions of the course exam are used for each course offering;~~
-
- ~~NOTE: The Department will make available its existing bank of exam questions, which may be periodically updated.~~
-
- ~~(15) A copy of the course sign in/sign out log the training provider will use to track the times that students arrive and depart the course, including the times out and in for any lunch break. This log is to be filled in by the students when entering and exiting the classroom.~~

C. Renewal Application Requirements for Approval of Training Courses . The applicant must demonstrate it meets the following requirements for renewal of approval of training courses:

- (1) Submission of a renewal application;
- (2) Submission of any changes in the course content, curriculum, instructors, and exam questions and procedures;
- (3) Compliance with the following:
 - (a) Standards of Conduct set forth in Section 5(F) -these rules; and
 - (b) Maintaining enance of the training/facility standards and course content set forth in the original license application.

~~standards of training for which approval was given; and~~

~~(e) Provision of instruction required by this section and 40 CFR, Part 763, Subpart E; and~~

~~(4) Written response to Department training course audit findings addressing how each finding has been incorporated into course curricula/materials or facility standards noted in the audit. Incorporation of changes suggested by the Department.~~

D. Successful Course Completion. Successful completion of a training course requires that a student attend at least 90% of course time and achieve a score of 70% or greater on the course exam. Except refreshers, primary instructors can not be considered students for consideration of successful course completion.

E. Examinations (Exams)

(1) General Requirements. Exams are required for all training courses conducted pursuant to this rule. Passing an exam is achieved when a student achieves a score of 70% or higher. Failure of an exam requires:

(a) That a student retake the initial or refresher training course exam once.

(b) That a student not passing the second exam must attend 8 hours of remedial training prior to taking the initial or refresher training course exam again.

(c) That a student failing the third exam after taking the remedial training must take the initial or refresher training course again along with the training course exam.

(d) The Training Provider will grade the exam and communicate the course results to the Department within 5 working days. The course results must include the type of course, the names, social security numbers, and exam scores of all participants.

(2) Initial Exam. Initial training courses require a final exam, which shall be provided and administered by the Training Provider. The Department will provide the Training Provider with a matrix describing the topics on the exam, the number of questions required on each exam, and the approximate percentage of questions on each topic. ~~except that the Department reserves the right to provide and/or administer final course exams. Alternate procedures, including, but not limited to, those arising out of reciprocal agreements with other states, must be approved in writing.~~

NOTE: ~~The Department will provide the Training Provider with a matrix describing the topics on the exam, the number of questions required on each exam, and the approximate percentage of questions on each topic.~~

(3) Refresher Course Exam. Exams developed and administered by a licensed Training Provider are required for annual refresher training courses. The exam shall be a minimum of 25 questions, shall be approved by the Department, and shall adequately address the refresher topics referenced in Appendix C, Interim Final Rule, 59 FR 5236-5260 (effective April 4, 1994) to Subpart E of 40 CFR Part 763 "Asbestos-Containing Materials in Schools" rule (effective December 14, 1987), and other requirements listed in this rule.

- F. Reciprocity.** Reciprocity of successful completion of training courses is allowed by this rule. Individuals seeking certification in Maine must submit documentation to the Department affirming that the training they received was at least as stringent as the training course requirements of this rule. Any of the requirements of this section, as well as the requirements for licensure of Training Providers set forth in this rule, may be requested by the Department when determining adequacy of training courses.
- G. Course Notification to Department.** Training Providers must notify the Department in writing of asbestos training courses conducted pursuant to this rule within the geographic boundaries of the State of Maine, on forms approved by the Department and at least 10 calendar days prior to the start date of the course. Included in the notification shall be the location of the course offering, and if other than the business location of the Training Provider, sufficient information to demonstrate that the new location is adequate for the training and learning purposes of the course. Courses not properly notified to the Department may not be approved by the Department. The Training Provider shall notify the Department via facsimile or phone of the cancellation of any course no later than 7:00 a.m. the day of the course.
- H. Course Times.** Training courses conducted pursuant to these rules shall be provided during normal business day hours, Monday to Friday, and no earlier than 7 AM and not later than 6 PM. Training shall not occur on state holiday days. A course day must not be less than 6 ½ hours or exceed 8 hours in duration, excluding lunch and breaks. Other course days and times may be approved by the Department on a case-by-case basis. Courses must be completed within a two week period.

11. Regulations Incorporated by Reference

- A. Harmony.** These rules attempt to be consistent with federal asbestos rules and regulations established by OSHA and US EPA. However, regulations established by OSHA and EPA are inconsistent, therefore these rules can not be entirely consistent with both agencies. These rules are promulgated with the welfare of the general public and the environment as a highest concern and are intended to promote safe and proper asbestos management in Maine. No provision of this rule shall be construed to pre-empt or supersede any other provision established under another statute or jurisdiction.
- B. Regulations Incorporated.** The following federal rules and regulations of the US EPA are incorporated by reference herein as Maine Department of Environmental Protection, *Asbestos Management Regulations*, 06-096 CMR 425:
- (1) Asbestos-Containing Materials in Schools rule; 40 CFR, Part 763, Subpart E (effective December 14, 1987); and
 - (2) US EPA Asbestos Model Accreditation Plan; Interim Final Rule, 59 FR 5236-5260 (effective April 4, 1994), Appendix C to Subpart E of 40 CFR Part 763 "Asbestos-Containing Materials in Schools" rule (effective December 14, 1987).
- C. Applicability.** The applicability of each rule and regulation incorporated herein by reference is outlined below.
- (1) Subpart E of the Asbestos-Containing Materials in Schools rule (40 CFR, Part 763). This rule is applicable to Local eEducation agencies (LEAs) in Maine. This federal regulation establishes ongoing inspection and management criteria for asbestos in schools and is not applicable to any other facilities in Maine.

- (2) Interim Final Rule, 59 FR 5236-5260, Appendix C to Subpart E of the Asbestos-Containing Materials in Schools rule (40 CFR, Part 763). This rule establishes minimal training course and training provider requirements for persons seeking state certification and applies to all persons conducting asbestos abatement activities who may seek state certification in Maine, as well as training providers offering asbestos training courses.

D. Substitution of Definitions. The provisions of federal regulation that are incorporated by reference into this rule can be understood in terms of State law by making the following substitution in terms utilized therein:

"EPA" means the "Maine Department of Environmental Protection (DEPARTMENT)";

"Regional Administrator" and "Director" means the "Board of Environmental Protection or its designated representative"; and

"Definitions" shall mean the definition of each term as it applies to the applicable law, regulation, or rule in which the definition is found. Defined terms are therefore specific to the regulation, law, or rule in which they are found and not meant to be generic in nature.

E. Conflict of Federal and State Law. Where the provisions and/or terms of the federal rules and/or regulations incorporated by reference into this rule differ from or are inconsistent with other terms and/or provisions of this rule, the term and/or provision of the more stringent rule shall apply.

STATUTORY AUTHORITY: 38 M.R.S.A. Sections 1274-A, 1275, 1280, and 1282.

ORIGINALLY ADOPTED:

February 1, 1989 - filing 89-32, Ch. 136, "Asbestos Abatement Regulations"

REPEALED AND REPLACED:

January 1, 1994 - filing 93-461, "Asbestos Management Regulations"

EFFECTIVE DATE (ELECTRONIC CONVERSION):

May 4, 1996

REPEALED AND REPLACED:

January 14, 2003 - filing 2003-14

AMENDED:

May 29, 2004 - filing 2004-175

AMENDED:

This is based on EPA's "Interpretive Rule Governing Roof Removal Operations 40 CFR Part 61 Appendix A to Subpart M dated June 17, 1994 which states that cutting 5,580ft² of asbestos-containing roofing material creates 160ft² of friable ACM, the point at which the roof project become subject to federal NESHAP requirements; Cutting 105 ft² of asbestos-containing roofing material creates 3ft² of ACM the regulatory threshold of an "asbestos abatement activity" per Maine asbestos laws and regulations. Therefore, if the total amount of roofing material to be removed is less than 105 sqft², then the activity is not subject to the rule.